

DRAFT
Program Environmental Impact Report
City of Pleasanton 2023-2031 (6th Cycle) Housing Element Update
City of Pleasanton, Alameda County, California
State Clearinghouse Number 2022040091

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ACRONYMS AND ABBREVIATIONS

°C	degrees Celsius (Centigrade)
°F	degrees Fahrenheit
µg/m ³	micrograms per cubic meter
AAQS	Ambient Air Quality Standards
AB	Assembly Bill
ABAG	Association of Bay Area Governments
ACEH	Alameda County Environmental Health
ACFD	Alameda County Fire Department
ACHP	Advisory Council on Historic Preservation
ACM	asbestos-containing material
ACP	Alternative Compliance Plan
ADA	Americans with Disabilities Act
ADL	Aerially Deposited Lead
ADT	Average Daily Traffic
ADU	accessory dwelling unit
AF	acre-feet
AFY	acre-feet per year
AIA	Airport Influence Area
AIC	Archaeological Information Center
AICUZ	Air Installation Compatibility Use Zone
AIRFA	American Indian Religious Freedom Act
ALUC	Airport Land Use Commission
ALUCP	Airport Land Use Compatibility Plans
ALUPP	Airport Land Use Policy Plan
AMI	Area Median Income
APCD	Air Pollution Control District
APE	Area of Potential Effect
APN	Assessor's Parcel Number
AQI	Air Quality Index
AQMD	Air Quality Management District
AQP	Air Quality Plan
ARB	California Air Resources Board
ARPA	Archaeological Resources Protection Act
AST	aboveground storage tank
ASTM	American Society for Testing and Materials

Acronyms and Abbreviations

ATCM	Airborne Toxic Control Measures
BAAQMD	Bay Area Air Quality Management District
BACT	Best Available Control Technology
BART	Bay Area Rapid Transit
BAU	Business as Usual
BCF	billion cubic feet
BCF/year	billion cubic feet per year
BMP	Best Management Practice
BP	Before Present
BRA	Biological Resource Assessment
BTU	British Thermal Unit
BVOC	biogenic volatile organic compound
C ² ES	Center for Climate and Energy Solution
CAA	Clean Air Act
CAAQS	California Ambient Air Quality Standards
CAFE	Corporate Average Fuel Economy
CAL FIRE	California Department of Forestry and Fire Protection
Cal Water	California Water Service
Cal/EPA	California Environmental Protection Agency
Cal/OES	California Governor's Office of Emergency Services
Cal/OSHA	California Occupational Health and Safety Administration
CalEEMod	California Emissions Estimator Model
CALGreen	California Green Building Standards Code
CalRecycle	California Department of Resources Recycling and Recovery
Caltrans	California Department of Transportation
CAP	Climate Action Plan
CAPCOA	California Air Pollution Control Officers Association
CARE	Community Air Risk Evaluation
CBC	California Building Standards Code
CCAA	California Clean Air Act
CCCC	California Climate Change Center
CCR	California Code of Regulations
CCTS	Central California Taxonomic System
CDF	California Department of Finance
CDFW	California Department of Fish and Wildlife
CEC	California Energy Commission
CEQA	California Environmental Quality Act
CERCLA	Comprehensive Environmental Response, Compensation, and Liability Act

CESA	California Endangered Species Act
CFC	chlorofluorocarbon
CFR	Code of Federal Regulations
CGS	California Geological Survey
CH ₄	methane
CHL	California Historical Landmarks
CHP	California Highway Patrol
CHRIS	California Historical Resources Information System
CIP	Capital Improvement Program
CMP	Congestion Management Plan
CNDDDB	California Natural Diversity Database
CNEL	Community Noise Equivalent Level
CNPS	California Native Plant Society
CNPSEI	California Native Plant Society Electronic Inventory
CNRA	California Natural Resources Agency
CO	carbon monoxide
CO ₂	carbon dioxide
CO ₂ e	carbon dioxide equivalent
CoIWMP	Alameda County Countywide Integrated Waste Management Plan
CPHI	California Points of Historical Interest
CPUC	California Public Utilities Commission
CRA	Cultural Resources Assessment
CRHR	California Register of Historical Resources
CRRP	Community Risk Reduction Plan
CTC	County Transportation Commission
CTF	Centralized Treatment Facility
CTP	Countywide Transportation Plan
CTR	California Toxics Rule
CTS	California tiger salamander
CUPA	Certified Unified Program Agency
CWA	Clean Water Act
CZ	Conservation Zone
dB	decibel
dBA	A-weighted decibel
dBA/DD	dBA per each doubling of distance
DBH	diameter at breast height
DCE	dichloroethane
DERWA	DSRSD-EBMUD Recycled Water Authority

Acronyms and Abbreviations

DOE	United States Department of Energy
DPM	diesel particulate matter
DPR	Department of Parks and Recreation
DSP	Downtown Specific Plan
DSRSD	Dublin San Ramon Services District
DTSC	California Department of Toxic Substances Control
du	dwelling unit
du/acre	dwelling unit per acre
DWR	California Department of Water Resources
EACCS	East Alameda County Conservation Strategy
EBCE	East Bay Community Energy
EBDA	East Bay Dischargers Authority
EBMUD	East Bay Municipal Utility District
EBRPD	East Bay Regional Parks District
EDD	California Employment Development Department
EIA	United States Energy Information Administration
EIR	Environmental Impact Report
EISA	Energy Independence and Security Act of 2007
EMS	Emergency Medical Services
EMT	Emergency Medical Technician
EPA	United States Environmental Protection Agency
EV	electric vehicle
FAA	Federal Aviation Administration
FAR	floor area ratio
FCS	FirstCarbon Solutions
FEMA	Federal Emergency Management Agency
FGC	Fish and Game Code
FHSZ	Fire Hazard Severity Zone
FHWA	Federal Highway Administration
FIA	Federal Insurance Administration
FIRM	Flood Insurance Rate Map
FMMP	California Department of Conservation Farmland Mapping and Monitoring Program
FRA	Federal Responsibility Area
FRAP	CAL FIRE Fire and Resource Assessment Program
GHAD	Geologic Hazard Abatement District
GHG	greenhouse gas
GMP	Growth Management Program
GPA	General Plan Amendment

GPCD	gallons per capita per day
gpm	gallons per minute
GPS	Global Positioning System
GSA	Groundwater Sustainability Agency
GSP	Groundwater Sustainability Plan
GWDR	General Waste Discharge Requirements
GWh	gigawatt-hours
GWh/y	gigawatt-hours per year
GWP	global warming potential
HAP	Hazardous Air Pollutants
HCD	California Department of Housing and Community Development
HCM	Highway Capacity Manual
HCP	Habitat Conservation Plan
HDR	High Density Residential
HEU	Housing Element Update
HFC	hydrofluorocarbon
HMBP	Hazardous Materials Business Plan
HMC	Housing Methodology Committee
HMUPA	Hazardous Materials Unified Program Agency
HOV/HOT	High Occupancy Vehicle/High Occupancy Toll
HRA	Health Risk Assessment
HRI	California Historic Resources Inventory
HSC	California Health and Safety Code
HUD	California Department of Housing and Community Development
HVAC	heating, ventilation, and air conditioning
HWCL	Hazardous Waste Control Law
IAQ	Indoor Air Quality
ICC	International Code Council
IFC	International Fire Code
IOU	investor-owned utility
IPaC	Information for Planning and Consultation
IPCC	United Nations Intergovernmental Panel on Climate Change
ISO	Independent System Operator
ISTEA	Intermodal Surface Transportation Efficiency Act
IWMP	Integrated Waste Management Plan
IZO	Inclusionary Zoning Ordinance
JADU	junior accessory dwelling unit
kW	kilowatts

Acronyms and Abbreviations

LAFCo	Local Agency Formation Commission
LAVTA	Livermore Amador Valley Transit Authority
LAVWMA	Livermore-Amador Valley Water Management Agency
LBP	lead-based paint
LCFS	Low Carbon Fuel Standard
L _{dn}	day/night average sound level
LDR	Low Density Residential
LED	light-emitting diode
L _{eq}	equivalent sound level
LEV	Low Emission Vehicle
LHMP	Local Hazard Mitigation Plan
LMDR	Low/Medium Density Residential
LOS	Level of Service
LPFD	Livermore-Pleasanton Fire Department
LRA	Local Responsibility Area
LSE	load-serving entities
LUST	Leaking Underground Storage Tank
LWRP	Livermore Water Reclamation Plant
MBTA	Migratory Bird Treaty Act
MDR	Medium Density Residential
mg/l	milligrams per liter
mgd	million gallons per day
MM	Mitigation Measure
mm/year	millimeters per year
MMBTU	Million Metric British Thermal Units
MMI	Modified Mercalli Intensity
MMRP	Mitigation Monitoring and Reporting Program
mph	miles per hour
MPO	Metropolitan Planning Organization
MRP	Municipal Regional Permit
MS4	Municipal Separate Storm Sewer Systems
MTC	Metropolitan Transportation Commission
MTS	Metropolitan Transportation System
Mw	Maximum Moment Magnitude Earthquake
MW	megawatt
MWD	Metropolitan Water District of Southern California
MWELO	Model Water Efficient Landscape Ordinance
MXD	mixed-use development

N ₂ O	nitrous oxide
NAAQS	National Ambient Air Quality Standards
NAGPRA	Native American Graves Protection and Repatriation Act
NAHC	Native American Heritage Commission
NEHRP	National Earthquake Hazards Reduction Program
NEPA	National Environmental Policy Act
NESHAP	National Emissions Standards for Hazardous Air Pollutants
NF ₃	nitrogen trifluoride
NFIP	National Flood Insurance Program
NFPA	National Fire Protection Association
NHM	Natural History Museum of Los Angeles County
NHPA	National Historic Preservation Act
NHRP	National Register of Historic Places
NHTSA	National Highway Traffic Safety Administration
NO ₂	nitrogen dioxide
NOAA Fisheries	National Marine Fisheries Service
NOC	Notice of Completion
NOI	Notice of Intent
NOP	Notice of Preparation
NO _x	nitrogen oxides
NPDES	National Pollutant Discharge Elimination System
NPPA	Native Plant Protection Act
NRCS	Natural Resources Conservation Service
NRHP	National Register of Historic Places
NTR	National Toxics Rule
NWIC	Northwest Information Center
O ₃	ozone
OAL	Office of Administrative Law
OEHHA	California Office of Environmental Health Hazard Assessment
OES	Office of Emergency Services
OHWM	ordinary high water mark
ONAC	Federal Office of Noise Abatement and Control
OPR	Governor's Office of Planning and Research
OSHA	Occupational Safety and Health Administration
PCB	polychlorinated biphenyl
PCE	tetrachloroethylene
pCi/L	picocuries per liter
PERP	Portable Equipment Registration Program

Acronyms and Abbreviations

PFAS	polyfluoroalkyl substances
PFC	perfluorocarbon
PG&E	Pacific Gas and Electric Company
PGA	peak ground acceleration
PGS	Pleasanton Garbage Service
Phase I ESA	Phase I Environmental Site Assessment
PHB	Pedestrian Hybrid Beacons
PI	Public and Institutional
PM ₁₀	particulate matter, including dust, 10 micrometers or less in diameter
PM _{2.5}	particulate matter, including dust, 2.5 micrometers or less in diameter
PM _x	particulate matter
ppb	parts per billion
ppm	parts per million
PPV	peak particle velocity
PRC	Public Resources Code
PSHA	probabilistic seismic hazard assessment
PUD	Planned Unit Development
PUSD	Pleasanton Unified School District
PV	photovoltaics
PVC	polyvinyl chloride
RCRA	Resource Conservation and Recovery Act
Recology	Integrated Resource Recovery Company
RecycleSmart	Central Contra Costa County Solid Waste Authority
REL	Reference Exposure Level
RHNA	Regional Housing Needs Allocation
RMP	Refrigerant Management Program
rms	root mean square
ROG	reactive organic gases
RPS	Renewables Portfolio Standard
RRFB	Rectangular Rapid-Flashing Beacons
RTP	Regional Transportation Plan
RWQCB	Regional Water Quality Control Board
RWTF	Regional Wastewater Treatment Facility
SARA	Superfund Amendments and Reauthorization Act
SB	Senate Bill
SCAQMD	South Coast Air Quality Management District
SCH	State Clearinghouse
SCS	Sustainable Communities Strategy

SF ₆	sulfur hexafluoride
SFBAAB	San Francisco Bay Area Air Basin
SFPUC	San Francisco Public Utilities Commission
SGMA	Sustainable Groundwater Management Act
SIP	State Implementation Plan
SO ₂	sulfur dioxide
SOI	Sphere of Influence
South Coast AQMD	South Coast Air Quality Management District
SPCC	Spill Prevention, Control, and Countermeasure
SR	State Route
SR-24	State Route 24
SRA	State Responsibility Area
SRO	Single Room Occupancy
SSMP	Sewer System Management Plan
State Water Board	California State Water Resources Control Board
SWAT	Special Weapons and Tactics
SWPPP	Storm Water Pollution Prevention Plan
TAC	toxic air contaminant
TAF	Transportation Analysis Framework
TAZ	Traffic Analysis Zones
TCAC	California Tax Credit Allocation Committee
TCE	Trichloroethylene
TCM	transportation control measures
TCR	Tribal Cultural Resource
TDM	Transportation Demand Management
TDS	total dissolved solids
TDV	Time Dependent Valuation
TEA-21	Transportation Equity Act for the 21 st Century
Tg	teragram
therms/y	therms per year
TIA	Traffic Impact Analysis
TIS	Traffic Impact Study
TISG	Transportation Impact Study Guide
TMA	Transportation Management Association
TMDL	Total Maximum Daily Load
TOD	Transit Oriented Development
TPH	Total Petroleum Hydrocarbons
TRU	Transport Refrigeration Unit

Acronyms and Abbreviations

UBC	Uniform Building Code
UCERF	Uniform California Earthquake Rupture Forecast
UCMP	University of California Museum of Paleontology
UFC	State Uniform Fire Code
UGB	Urban Growth Boundary
UPRR	Union Pacific Railroad
USACE	United States Army Corps of Engineers
USC	United States Code
USDA	United States Department of Agriculture
USDOT	United States Department of Transportation
USFWS	United States Fish and Wildlife Service
USGS	United States Geological Survey
UST	underground storage tank
UTV	Utility Terrain Vehicle
UV	ultraviolet
UWMP	Urban Water Management Plan
V/C	volume to capacity ratio
Valley Air District	San Joaquin Valley Air Pollution Control District
VDECS	Verified Diesel Emission Control Strategies
VHFHSZ	Very High Fire Hazard Severity Zone
VMT	Vehicle Miles Traveled
VOC	volatile organic compound
WDR	Waste Discharge Requirements
WMA	Waste Management Authority
WMP	Waste Management Plan
WQMP	Water Quality Management Plan
WSA	Water Supply Assessment
WSCP	Water Shortage Contingency Plan
WUI	Wildland Urban Interface
WWTP	Wastewater Treatment Plant
ZEV	Zero-Emission Vehicle

EXECUTIVE SUMMARY

Purpose

This Draft Program Environmental Impact Report (Draft Program EIR) is prepared in accordance with the California Environmental Quality Act (CEQA) to evaluate the potential environmental impacts associated with the implementation of the proposed 2023-2031 (6th Cycle) Housing Element Update, rezonings, General Plan and Specific Plan Amendments (collectively referred to herein as the Housing Element Update) (State Clearinghouse No2022040091). This document is prepared in conformance with CEQA (Public Resources Code [PRC] § 21000, *et seq.*) and the CEQA Guidelines (California Code of Regulations [CCR], Title 14, § 15000, *et seq.*).

The purpose of this Draft Program EIR is to inform decision makers, representatives of affected and responsible agencies, the public, and other interested parties of the potential environmental effects that may result from implementation of the Housing Element Update. This Draft Program EIR describes potential impacts relating to a wide variety of environmental issues and methods by which these impacts can be mitigated or avoided.

Project Summary

Project Location

The City of Pleasanton (City) is in Alameda County, California, one of the nine Bay Area counties bordering the San Francisco Bay (Exhibit 2-1 in Chapter 2, Project Description) and is generally bound to the west by Pleasanton Ridgeland; to the north by Interstate 580 (I-580) and the City of Dublin; to the east by unincorporated land, including existing and former quarry lands, and by the City of Livermore; and to the south by the San Francisco Water Department lands. I-680 runs north to south and bisects the western portion of the city.

The Pleasanton Sphere of Influence (SOI), which signifies the probable ultimate physical boundary and service area (Exhibit 2-2 in Chapter 2, Project Description) of the City, includes 42.2 square miles (27,200 acres). The SOI has been adopted by the Alameda County Local Agency Formation Commission (LAFCo). The SOI includes lands incorporated within the city limits, as well as unincorporated land over which Alameda County has zoning and land use authority.

Pleasanton has identified a total of 25 sites for potential rezoning, listed in Table 2-1 and in Exhibit 2-2 in Chapter 2, Project Description. All these sites, aside from Sites 1 and 22, are located within the city limits. Site 22 is in unincorporated Alameda County but within Pleasanton's SOI and Urban Growth Boundary. Site 1 is also located in unincorporated Alameda County but within the SOI; however, the western half of Site 1 is also located just outside the Urban Growth Boundary (UGB) (Exhibit 2-2 in Chapter 2, Project Description). This Draft Program EIR focuses on the sites identified in the Housing Element Update that could potentially be zoned for residential use (referred to as the "potential sites for rezoning" or "rezoning sites").

Project Description

State law dictates that each city and county in California evaluate local housing needs and, as part of the Housing Element, prepare a realistic set of policies and programs to fulfill those needs in conjunction with the local government's long range General Plan. Each city and county must maintain a General Plan as a guide for the physical development of the community. This required evaluation of housing needs and resulting program and policies is included as the "Housing Element" of a local government's General Plan. Additionally, each Bay Area city's share of the regional housing need is based on a plan, prepared by the Association of Bay Area Governments and the Metropolitan Transportation Commission (ABAG/MTC), entitled the Final RHNA Plan: San Francisco Bay Area, 2023-2031, (RHNA Plan). In addition to accommodating the City's Regional Housing Needs Allocation (RHNA), this Housing Element Update includes several programs intended to improve the quality of the housing inventory, conserve existing neighborhoods, increase housing affordability, and remove potential governmental and non-governmental constraints to housing for households of all income levels and needs.

In accordance with State law, the City proposes to adopt a General Plan Amendment to update the General Plan's existing Housing Element, including designating sites and identifying updated goals, policies, and actions, along with revisions to the General Plan Land Use Element to ensure consistency between it and the Housing Element, i.e., updating the General Plan land use plan to expand the inventory of land available for the development of new housing within the city and making text amendments to ensure density ranges for designated projects are consistent with those described in the Land Use Element.

The City would also amend the General Plan land use designation of the sites identified in Table 2-1, as shown in Table 2-9 in Chapter 2, Project Description, sufficient to meet the remaining unmet housing need. The City would rezone the sites identified in Table 2-1, as shown in Table 2-9 in Chapter 2, Project Description, for consistency with the General Plan Amendments. Compliance with Assembly Bill (AB) 2923 to allow for a minimum density of 75 du/acre and increased height for the Dublin-Pleasanton Bay Area Rapid Transit (BART) station property could require an amendment to the General Plan.

Amendments to the Hacienda Planned Unit Development (PUD) Development Plan and the Vineyard Avenue Corridor Specific Plan may be necessary and are addressed programmatically in this Draft Program EIR.

To present a conservative analysis of potential environmental impacts, this Draft Program EIR assumes a maximum of 7,787 net new dwelling units. Refer to Chapter 2, Project Description, for a complete description of the Housing Element Update.

Project Objectives

CEQA Guidelines, Section 15124(b), require that the project description in a Draft Program EIR include "a statement of the objectives sought by the proposed project," which should include "the underlying purpose of the project." The underlying purpose of the Housing Element Update is to accommodate the RHNA and increase the inventory of land available for the development of

housing compliant with State law and consistent with the General Plan. The following are the primary project objectives for the Housing Element Update:

- Provide a vision for housing through 2031.
- Maintain the existing housing inventory to serve housing needs.
- Meet the City's fair share of the regional housing need to accommodate projected population growth and meet existing housing needs within the City.
- Ensure capacity for development of new housing to meet the RHNA at all income levels.
- Encourage housing development where supported by existing or planned infrastructure while maintaining existing neighborhood character.
- Encourage, develop, and maintain programs and policies to meet existing projected affordable housing needs, including for special needs populations such as persons with disabilities, seniors, the unhoused, and larger households.
- Develop a vision for Pleasanton that supports sustainable local, regional, and State housing and environmental goals.
- Provide new housing communities with substantial amenities to provide a high quality of life for residents.
- Adopt a housing element that complies with California Housing Element Law and can be certified by the State Department of Housing and Community Development (HCD).

Significant Unavoidable Adverse Impacts

The Housing Element Update would result in the following significant unavoidable impacts:

- **Project-Level Vehicle Miles Traveled:** Many of the potential sites for rezoning are located in areas which are expected to generate a home-based VMT per resident above the relevant threshold of significance. Mitigation Measure (MM) TRANS-2 requires individual housing project development proposals that do not screen out from a VMT impact analysis to provide a quantitative VMT analysis and, if results indicate the VMT associated with the individual housing project would be above the threshold, it would be required to include VMT reduction measures as provided in MM TRANS-2. Combining reduction measures reduces their effectiveness resulting in a cap on the total VMT reduction these measures can provide. Because the effectiveness of the measures in reducing an individual development project's VMT impact to a less than significant level cannot be confirmed in this analysis, the impact would remain significant and unavoidable.
- **Cumulative Vehicle Miles Traveled:** Cumulative projects in the nine-county Bay Area will generate new VMT, which would be added to the roadway network within the geographic context. All cumulative projects would be required to comply with applicable local regulations and General Plan policies that address VMT, as well as mitigate their fair share of impacts related to VMT. Nonetheless, the Housing Element Update, in conjunction with other past,

present, and future projects, would have a cumulatively significant impact related to VMT. Development consistent with the Housing Element Update would result in a significant and unavoidable cumulatively considerable contribution to the existing cumulative VMT impact even with mitigation incorporated. Even with incorporation of MM TRANS-2, the City may not achieve the overall VMT threshold reduction level due to uncertainty in the cumulative effectiveness of the measures included in MM TRANS-2 as well as unknowns related to transit service levels, transportation technology, and travel behavior. Moreover, these policies and measures primarily apply to new developments; existing land uses that have already been approved and are under construction are generally not affected. Because of the programmatic nature of the Housing Element Update, no additional mitigation measures are available, and the cumulative impact is considered significant and unavoidable.

- **Project-Level Water Supply:** With all the City's groundwater supply wells potentially being taken out of commission in 2023, and unless the supply is either replaced or restored, there would be a significant projected water supply deficiency for all years reported in this Draft Program EIR. The deficiency ranges from approximately 12 percent to approximately 25 percent.¹ Without the groundwater supply, there would not be enough water available to account for development consistent with the Housing Element Update unless alternative water supplies are identified, such as purchasing additional water from Zone 7, or the City pursues a groundwater wells rehabilitation project, which would allow it to resume use of local groundwater. Although Zone 7 has sufficient supplies available, because the City is still evaluating options for additional water and has not finalized additional supplies at time of publication of this Draft Program EIR, the potential water supply deficiency is considered significant for the purposes of this analysis. Therefore, although the analysis provided in this Draft Program EIR is conservative, decommissioning all of the City's ground water supply wells would result in projected water supply that would not be sufficient to accommodate development consistent with the Housing Element Update and there is no mitigation available to reduce impacts to a less than significant level. Therefore, this impact would remain significant and unavoidable.
- **Cumulative Water Supply:** With all the City's groundwater supply wells potentially being taken out of commission in 2023, and unless the supply is either replaced or restored, there would be a significant projected water supply deficiency for all years reported in this Draft Program EIR. The cumulative deficiency ranges from approximately 12 percent to approximately 30 percent.² Without the groundwater supply, there would not be enough water available to account for cumulative development. In addition, as discussed in the Water Supply Assessment (WSA), based on 2020 Urban Water Management Plan reported City water supply and demand values, the decommissioning of all City groundwater wells would create a

¹ As discussed in Section 3.15, Utilities and Service Systems, the Housing Element Update is anticipated to result in a deficiency of approximately 12 to approximately 25 percent (see Table 3.15-8 in Section 3.15, Utilities and Service Systems), whereas the water demand for the Housing Element Update and the anticipated additional growth is anticipated to result in a deficiency of approximately 12 to 30 percent (see Table 3.15-10 in Section 3.15, Utilities and Service Systems).

² As discussed in Section 3.15, Utilities and Service Systems, the Housing Element Update is anticipated to result in a deficiency of approximately 12 to approximately 25 percent (see Table 3.15-8 in Section 3.15, Utilities and Service Systems), whereas the water demand for the Housing Element Update and the anticipated additional growth is anticipated to result in a deficiency of approximately 12 to 30 percent (see Table 3.15-10 in Section 3.15, Utilities and Service Systems).

projected water supply deficiency in the City even without implementation of the Housing Element Update. As discussed in this Draft Program EIR, the City is actively exploring alternative water supply options to account for the loss of groundwater supply, such as purchasing additional water from Zone 7, or a groundwater wells rehabilitation project, which would allow it to resume use of local groundwater. Although Zone 7 has sufficient supplies available, because the City is still evaluating options for additional water and has not finalized additional supplies at time of publication of this Draft Program EIR, the potential water supply deficiency is considered significant for the purposes of this analysis. Therefore, although the analysis provided in this Draft Program EIR is conservative, decommissioning all of the City's ground water supply wells would result in projected water supply that would not be sufficient to accommodate cumulative development and there is no mitigation available to reduce this cumulative impact to a less than significant level. Therefore, this cumulative impact would be significant and unavoidable.

Summary of Project Alternatives

Below is a summary of the alternatives to the proposed Housing Element Update considered in Chapter 6, Alternatives to the proposed Housing Element Update.

No Project Alternative

Under the No Project Alternative, the Housing Element would not be updated with new policies and no zoning or land use designation changes would occur. Future development would be in accordance with the current land use and zoning maps identified in the City of Pleasanton General Plan. The existing Housing Element (2051-2023) plans for an increase of approximately 10,800 new residents and an addition of 3,243 housing units.³ Under this alternative, the current goals, policies, and zoning would remain in place.

Alternative 1-Remove Select Industrial and Commercial Sites

Alternative 1, Remove Select Industrial and Commercial Sites, would remove some of the industrially/commercially zoned sites from the sites inventory list. Industrial zoned land, and commercially zoned sites that allow for service commercial uses such as auto repair, is limited throughout the city, so this alternative aims to preserve the existing zoning on those properties. Some retail commercial sites are also excluded from this alternative, to reflect community concerns about loss of local-serving retail. This alternative would result in a maximum development potential of 5,065 units in addition to the existing residential zoning (2,792 units) for a total of 7,857 unit.

Alternative 2-Transit-Oriented Focus Alternative

Alternative 2, Transit-Oriented Focus, would focus on sites in proximity to transit for rezoning to residential use. This alternative would remove the higher VMT sites as potential sites for rezoning

³ City of Pleasanton. 2014. Housing Element (2015-2023), Appendix A: Review and Assessment of 2007 Housing Element. June. Website: [chrome-extension://efaidnbmnnnibpcajpcglclefindmkaj/https://www.cityofpleasantonca.gov/pdf/Draft-HsgElem-June-2014.pdf](https://www.cityofpleasantonca.gov/pdf/Draft-HsgElem-June-2014.pdf). Accessed: October 17, 2022.

and instead focus new housing on sites that would result in relatively lower VMT, although some selected, higher VMT sites, including Sites 1 (Lester), 22 (Merritt) and 23 (Sunol Boulevard) were retained in the alternative, either because the City is actively processing development applications for them (Sites 1 [Lester] and 22 [Merritt]) or because the site is necessary to provide adequate sites to meet the RHNA (Site 23 [Sunol]). This alternative would result in a maximum development potential of 5,754 units in addition to the existing residential zoning (2,792 units) for a total of 8,546 units.

Alternative 3-Site Rankings Focus

Early in the Housing Element process, the City Council approved a list of sites selection criteria to aid in the evaluation of potential sites. The sites were ranked based on: (1) site size and infill criteria, (2) proximity to modes of transportation, (3) proximity to services and amenities, (4) environmental impacts/hazards, (5) impacts to sensitive resources, (6) height and mass compatibility, and (7) interest in site. This was used to create the initial list of sites for consideration for rezoning. In formulating the alternative, and to further refine the list, consideration was also provided as to feasibility, neighborhood compatibility (e.g. adjacency to existing residential uses), and support expressed by the community during the process to develop the Draft Housing Element. For Alternative 3, Site Rankings Focus Alternative, sites that scored lower based on these considerations and resultant site rankings would be removed. This alternative would result in a maximum development potential of 4,917 units in addition to the existing residential zoning (2,792 units) for a total of 7,709 units.

Areas of Controversy

Pursuant to CEQA Guidelines Section 15123(b), a summary section must address areas of controversy known to the lead agency, including issues raised by agencies and the public, and it must also address issues to be resolved, including the choice among alternatives and whether or how to mitigate the significant effects.

A Notice of Preparation (NOP) for the Housing Element Update was issued on April 6, 2022. The NOP describing the original concept for the Housing Element Update and issues to be addressed in the Draft Program EIR was distributed to the State Clearinghouse, responsible agencies, and other interested parties for a 30-day public review period extending from April 6, 2022, through May 5, 2022. The City received four comments letters on the NOP and no public comments at the Scoping Meeting. Copies of these letters are provided in Appendix A of this Draft Program EIR.

Disagreement Among Experts

This Draft Program EIR contains substantial evidence to support all the conclusions presented herein. It is possible that there will be disagreement among various parties regarding these conclusions, although the City of Pleasanton is not aware of any disputed conclusions at the time of this writing. Both the CEQA Guidelines and case law clearly provide the standards for treating disagreement among experts. Where evidence and opinions conflict on an issue concerning the environment, and the lead agency knows of these controversies in advance, an EIR must acknowledge the controversies, summarize the conflicting opinions of the experts, and include sufficient information

to allow the public and decision makers to make an informed judgment about the environmental consequences of a proposed project.

Potentially Controversial Issues

Below is a list of environmental topical areas that could potentially result in controversial issues that may be raised during the public review and hearing process of this Draft Program EIR:

- Biological Resources
- Cultural and Tribal Cultural Resources
- Hazardous Materials
- Land Use and Planning
- Transportation
- Utilities and Service Systems

It is also possible that evidence will be presented during the 45-day, statutory Draft EIR public review period that may create disagreement. Decision makers would consider this evidence during the public hearing process.

In rendering a decision on a project where there is disagreement among experts, the decision makers are not obligated to select the most environmentally preferable viewpoint. Decision makers are vested with the ability to choose whatever viewpoint is preferable and need not resolve a dispute among experts. In their proceedings, decision makers must consider comments received concerning the adequacy of the Draft Program EIR and address any objections raised in these comments. However, decision makers are not obligated to follow any directives, recommendations, or suggestions presented in comments on the Draft Program EIR, and can certify the Final Program EIR without needing to resolve disagreements among experts.

Public Review of the Draft Program EIR

Upon completion of the Draft Program EIR, the City of Pleasanton filed a Notice of Completion (NOC) with the State Office of Planning and Research to begin the public review period (PRC § 21161). Concurrent with the NOC, this Draft Program EIR has been distributed to responsible and trustee agencies, other affected agencies, surrounding cities, and interested parties, as well as all parties requesting a copy of the Draft Program EIR in accordance with Public Resources Code 21092(b)(3). During the public review period, the Draft Program EIR, including the technical appendices, is available for review at the City of Pleasanton offices and the City of Pleasanton Library. The address for each location is provided below:

City of Pleasanton, Planning Division
Monday through Friday, 9:00 a.m.–4:00 p.m.
City of Pleasanton
200 Old Bernal Avenue
Pleasanton, CA 94566

City of Pleasanton, Library
400 Old Bernal Avenue
Pleasanton, CA 94566
Hours:
Monday-Thursday, 10:00 a.m.-9:00 p.m.
Friday and Saturday, 10:00 a.m.-5:00 p.m.
Sunday, 1:00 p.m.-5:00 p.m.

Agencies, organizations, and interested parties have the opportunity to comment on the Draft Program EIR during the 45-day public review period. Written comments on this Draft Program EIR should be addressed to:

Megan Campbell, Associate Planner
City of Pleasanton
Community Development Department
Post Office Box 520
Pleasanton, CA 94566
Phone: 925.931.5610
Email: mcampbell@cityofpleasantonca.gov

Submittal of electronic comments in Microsoft Word or Adobe PDF format is encouraged. Upon completion of the public review period, written responses to all significant environmental issues raised will be prepared and made available for review by the commenting agencies at least 10 days prior to the public hearing before the City of Pleasanton on the Housing Element Update, at which the certification of the Final Program EIR will be considered. Comments received and the responses to comments will be included as part of the record for consideration by decision makers for the Housing Element Update.

Executive Summary Matrix

Table ES-1 below summarizes the impacts, mitigation measures, and resulting level of significance after mitigation for the relevant environmental issue areas evaluated for the Housing Element Update. The table is intended to provide an overview; narrative discussions for the issue areas are included in the corresponding section of this Program EIR. Table ES-1 is included in the Program EIR as required by CEQA Guidelines Section 15123(b)(1).

Table ES-1: Executive Summary Matrix

Impacts	Mitigation Measures	Level of Significance After Mitigation
Section 3.1—Aesthetics		
Impact AES-1: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not have a substantial adverse effect on a scenic vista.	No mitigation is necessary.	Less than significant impact.
Impact AES-2: Development consistent with Housing Element Update, rezonings, General Plan and Specific Plan Amendments would not substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic building within a State Scenic Highway.	No mitigation is necessary.	Less than significant impact.
Impact AES-3: Development consistent with Housing Element Update, rezonings, General Plan and Specific Plan Amendments would not, in non-urbanized areas, substantially degrade the existing visual character or quality of public views of the site and its surroundings. (Public views are those that are experienced from publicly accessible vantage point). Development consistent with Housing Element Update, rezonings, General Plan and Specific Plan Amendments would not, in urbanized areas, conflict with applicable zoning and other regulations governing scenic quality.	No mitigation is necessary.	Less than significant impact.
Impact AES-4: Development consistent with the Housing Element Update, rezonings, General Plan and Specific Plan Amendments would not create a new source of substantial light or glare which would adversely affect day or nighttime views in the area.	No mitigation is necessary.	Less than significant impact.

Impacts	Mitigation Measures	Level of Significance After Mitigation
Section 3.2—Air Quality		
<p>Impact AIR-1: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments could conflict with or obstruct implementation of the applicable air quality plan.</p>	<p>MM AIR-1a: Prior to the issuance of a grading or building permit, whichever is sooner, the project applicant for a potential site for rezoning shall submit an air quality construction plan detailing the proposed air quality construction measures related to the project such as construction phasing, construction equipment, and dust control measures, and such plan shall be approved by the Director of Community Development. Air quality construction measures shall include Basic Construction Mitigation Measures, as approved by the Bay Area Air Quality Management District (BAAQMD) in 2017, and, where construction-related emissions would exceed the applicable thresholds, Additional Construction Mitigation Measures, as recommended by the BAAQMD, shall be implemented to reduce emissions to acceptable levels. The air quality construction plan shall be included on all grading, utility, building, landscaping, and improvement plans during all phases of construction and for access roads, parking areas, and staging areas at construction sites.</p> <p>MM AIR-1b: For project sites where new sensitive receptors, such as residences, would be located within siting distances recommended by the Bay Area Air Quality Management District (BAAQMD) and California Air Resources Board (ARB), currently published in the ARB Air Quality and Land Use Handbook: A Community Health Perspective, or the latest available guidance as determined by the City of Pleasanton as the lead agency, to sources of Toxic Air Contaminants (TACs), the following measures shall be implemented for development on such sites to reduce exposure to TACs and improve indoor and outdoor air quality:</p> <p>Indoor Air Quality—In accordance with the recommendations of the BAAQMD, appropriate measures (refer to Section 5 of the BAAQMD CEQA Guidelines) shall be incorporated into building design in order to reduce the potential health risk due to exposure of sensitive receptors to TACs, including, but not limited to:</p> <ul style="list-style-type: none"> (a) locate sensitive receptors as far as possible from any freeways, major roadways or other sources of pollution (e.g., loading docks, parking lots); (b) incorporate tiered plantings of trees (redwood, deodar cedar, live oak, 	<p>Less than significant impact with mitigation incorporated.</p>

Impacts	Mitigation Measures	Level of Significance After Mitigation
	<p>and/or oleander) to the maximum extent feasible between the sources of pollution and sensitive receptors;</p> <p>(c) install, operate and maintain in good working order a central heating ventilation and air conditioning (HVAC) system or other air take system in the building, or in each residential unit, that meets or exceeds an efficiency standard of MERV 13, including the following features: installation of high efficiency filter and /or carbon filter to filter particulates and other chemical matter from the building (either HEPA filters or ASHRAE 85 percent supply filters);</p> <p>(d) retain a qualified HVAC consultant or Home Energy Rating System (HERS) rater during the design phase of the project to locate the HVAC system based on exposure modeling from pollutant sources;</p> <p>(e) install indoor air quality monitoring in units in buildings; and</p> <p>(f) applicants shall maintain, repair or replace HVAC systems on an ongoing and as-needed basis, or prepare two operation and maintenance manuals for the HVAC systems and the filters: one manual shall be included in the recorded Conditions Covenants and Restrictions (CC&Rs) and distributed to building maintenance staff; the other manual a separate homeowners' manual with operating instructions and maintenance and replacement schedule for the HVAC system and filters that is distributed to owners.</p> <p>Project applicants shall retain a qualified air quality consultant to prepare a health risk assessment (HRA) in accordance with BAAQMD requirements to determine the exposure of project residents/occupants/users to air pollutants prior to PUD approval, issuance of a grading permit, or issuance of a building permit, which is sooner. The HRA shall be submitted to the Community Development Department for review and approval. The applicant shall implement the approved HRA mitigation measure recommendations, if any, in order to reduce exposure to TACs below BAAQMD thresholds of significance at the time of the project approval.</p> <p>Outdoor Air Quality– Individual and common exterior open space, including playgrounds, patios, and decks, shall either be shielded from the source of air pollution by buildings or otherwise buffered to further reduce air pollution for project occupants.</p>	

Impacts	Mitigation Measures	Level of Significance After Mitigation
<p>Impact AIR-2: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments could result in a cumulatively considerable net increase of any criteria pollutant for which the project region is nonattainment under an applicable federal or State ambient air quality standard.</p>	<p>Implement MM AIR-1a and MM AIR-1b.</p>	<p>Less than significant impact with mitigation incorporated.</p>
<p>Impact AIR-3: Development consistent with the Housing Element Update, rezonings, and General and Specific Plan Amendments could expose sensitive receptors to substantial pollutant concentrations.</p>	<p>Implement MM AIR-1b.</p>	<p>Less than significant impact with mitigation incorporated.</p>
<p>Impact AIR-4: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not result in other emissions (such as those leading to odors) adversely affecting a substantial number of people.</p>	<p>No mitigation is necessary.</p>	<p>Less than significant impact.</p>
<p>Section 3.3—Biological Resources</p>		
<p>Impact BIO-1: Development consistent with the Housing Element Update, rezonings, General Plan and Specific Plan Amendments could have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special-status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or United States Fish and Wildlife Service.</p>	<p>MM BIO-1: Biological Resource Assessment Prior to the issuance of entitlements for a project, applicants or sponsors of projects on sites where potential special-status species, migratory birds, or nesting birds are present (to be determined by a qualified Biologist) shall retain a qualified Biologist/Wetland Regulatory Specialist to prepare a Biological Resource Assessment (BRA). The BRA shall include a project-specific analysis of potential impacts on all biological resources, including impacts on special-status species and their habitat, migratory birds and other protected nesting birds, roosting bats, rare plants, sensitive communities, protected waters and wetlands (analyze project-specific compliance with Clean Water Act [CWA], Porter-Cologne Water Quality Act, and Fish and Game Code), wildlife corridors and nursery sites. The BRA shall develop and define prescriptive and site-specific measures reducing potential impacts to a less than significant level. These measures shall be included as conditions of approval for building and grading permits issues for demolition and construction. If a water feature is found to be jurisdictional or potentially jurisdictional, the</p>	<p>Less than significant impact with mitigation incorporated.</p>

Impacts	Mitigation Measures	Level of Significance After Mitigation
	<p>applicant shall comply with the appropriate permitting process with each agency claiming jurisdiction prior to disturbance of the feature.</p> <p>The project applicant or sponsor shall ensure that, if development of habitat occupied by special-status species, migratory or nesting birds must occur as determined by a qualified Biologist/Wetland Regulatory Specialist, species impacts shall be avoided or minimized, and, if required by a regulatory agency or the CEQA process, loss of wildlife habitat or individual plants shall be fully compensated on a site. If on-site mitigation is not feasible in the City’s discretion, it shall occur within the City of Pleasanton Planning Area whenever possible, with a priority given to existing habitat mitigation banks. Habitat mitigation shall be accompanied by a long-term management plan and monitoring program prepared by a qualified Biologist and include provisions for protection of mitigation lands in perpetuity through the establishment of easements and adequate funding for maintenance and monitoring; the time frame for the funding shall be detailed in the long-term management plan and monitoring program completed prior to disturbance of occupied habitat or water feature.</p>	
<p>Impact BIO-2: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments could have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, and regulations or by the California Department of Fish and Wildlife or United States Fish and Wildlife Service.</p>	<p>Implement MM BIO-1.</p>	<p>Less than significant impact with mitigation incorporated.</p>
<p>Impact BIO-3: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments could have a substantial adverse effect on State or federally protected wetlands (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means.</p>	<p>Implement MM BIO-1.</p>	<p>Less than significant impact with mitigation incorporated.</p>

Impacts	Mitigation Measures	Level of Significance After Mitigation
Impact BIO-4: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments could interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of wildlife nursery sites.	Implement MM BIO-1.	Less than significant impact with mitigation incorporated.
Impact BIO-5: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance.	No mitigation is necessary.	Less than significant impact.
Impact BIO-6: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or State Habitat Conservation Plan.	No mitigation is necessary.	No impact.
Section 3.4—Cultural Resources and Tribal Cultural Resources		
Impact CUL-1: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not cause a substantial adverse change in the significance of a historical resource pursuant to Section 15064.5.	No mitigation is necessary.	Less than significant impact.
Impact CUL-2: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not cause a substantial adverse change in the significance of an archaeological resource pursuant to Section 15064.5.	No mitigation is necessary.	Less than significant impact.
Impact CUL-3: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not disturb human remains, including those interred outside of formal cemeteries.	No mitigation is necessary.	Less than significant impact.

Impacts	Mitigation Measures	Level of Significance After Mitigation
<p>Impact CUL-4: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not cause a substantial adverse change in the significance of a Tribal Cultural Resource that is listed or eligible for listing in the California Register of Historical Resources, or in a local register of historical resources as defined in Public Resources Code Section 5020.1(k).</p>	<p>No mitigation is necessary.</p>	<p>Less than significant impact.</p>
<p>Impact CUL-5: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not cause a substantial adverse change in significance of a Tribal Cultural Resource determined by the lead agency, in its discretion and supported by substantial evidence, to be significant pursuant to the criteria set forth in subdivision (c) of Public Resources Code Section 5024.1.</p>	<p>No mitigation is necessary.</p>	<p>Less than significant impact.</p>
<p>Section 3.5—Energy</p>		
<p>Impact ENER-1: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not result in potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation.</p>	<p>No mitigation is necessary.</p>	<p>Less than significant impact.</p>
<p>Impact ENER-2: Development consistent with the Housing Element Update, rezonings, and General and Specific Plan Amendments would not conflict with or obstruct a State or local plan for renewable energy or energy efficiency.</p>	<p>No mitigation is necessary.</p>	<p>Less than significant impact.</p>
<p>Section 3.6—Geology and Soils</p>		
<p>Impact GEO-1: Development consistent with the Housing Element Update, rezonings, General Plan and Specific Plan Amendments would not directly or indirectly cause potential substantial adverse effects, including the risk of loss, injury or death involving:</p>	<p>No mitigation is necessary.</p>	<p>Less than significant impact.</p>

Impacts	Mitigation Measures	Level of Significance After Mitigation
i) Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault? Refer to Division of Mines and Geology Special Publication 42. ii) Strong seismic ground shaking. iii) Seismic-related ground failure, including liquefaction. iv) Landslides.		
Impact GEO-2: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not result in substantial soil erosion or the loss of topsoil.	No mitigation is necessary.	Less than significant impact.
Impact GEO-3: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse.	No mitigation is necessary.	Less than significant impact.
Impact GEO-4: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating substantial direct or indirect risks to life or property.	No mitigation is necessary.	Less than significant impact.
Impact GEO-5: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not have soils incapable of adequately supporting the use of septic tanks or alternative wastewater disposal systems where sewers are not available for the disposal of wastewater.	No mitigation is necessary.	Less than significant impact.

Impacts	Mitigation Measures	Level of Significance After Mitigation
<p>Impact GEO-6: Development consistent with the Housing Element Update, rezonings, and General Plan Specific Plan Amendments could directly or indirectly destroy a unique paleontological resource or site or unique geologic feature.</p>	<p>MM GEO-6: A professional paleontologist, approved by the City of Pleasanton, shall conduct a site-specific paleontological resources survey on the potential sites for rezoning.</p> <p>If any of the potential sites for rezoning are found to be underlain by older Quaternary deposits, or any other soil with the potential to contain vertebrate fossils due to their high paleontological sensitivity for significant resources, applicants, owners and/or sponsors of all future development or construction projects shall be required to perform or provide paleontological monitoring, if recommended by the qualified paleontologist. Should significant paleontological resources (e.g., bones, teeth, well-preserved plant elements) be unearthed by a future project construction crew, project activities shall be diverted at least 15 feet from the discovered paleontological resources until a professional paleontologist has assessed such discovered resources and, if deemed significant, such resources shall be salvaged in a timely manner. The applicant/owner/sponsor of said project shall be responsible for diverting project work and providing the assessment including retaining a professional paleontologist for such purpose. Collected fossils shall be deposited by the applicant/owner/sponsor in an appropriate repository (e.g., University of California Museum of Paleontology (UCMP), California Academy of Sciences) where the collection shall be properly curated and made available for future research.</p>	<p>Less than significant impact with mitigation incorporated.</p>
<p>Section 3.7—Greenhouse Gas Emissions</p>		
<p>Impact GHG-1: Development facilitated by the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment.</p>	<p>No mitigation is necessary.</p>	<p>Less than significant impact.</p>
<p>Impact GHG-2: Development facilitated by the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not conflict with any applicable plan, policy or regulation of an agency adopted for the purpose of reducing the emissions of greenhouse gases.</p>	<p>No mitigation is necessary.</p>	<p>Less than significant impact.</p>

Impacts	Mitigation Measures	Level of Significance After Mitigation
Section 3.8—Hazards and Hazardous Materials		
<p>Impact HAZ-1: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials.</p>	<p>No mitigation is necessary.</p>	<p>Less than significant impact.</p>
<p>Impact HAZ-2: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments could create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the likely release of hazardous materials into the environment.</p>	<p>MM HAZ-2: Environmental Site Assessment If a potential site for rezoning is suspected to contain hazardous materials, prior to building permits, the City shall ensure that each project applicant retain a qualified environmental consulting firm to prepare a Phase I Environmental Site Assessment (Phase I ESA) in accordance with the American Society for Testing and Materials (ASTM) Standards in effect at the time of request of issuance of building permits, which would ensure the City is aware of any hazardous materials on-site. The Phase I ESA shall determine the presence of recognized environmental conditions and provide recommendation for further investigation (e.g., preparation of a Phase II ESA, if applicable). Prior to receiving a building or grading permit, project applicants shall provide documentation from the overseeing agency (e.g., Alameda County Environmental Health [ACEH] or Regional Water Quality Control Board) that sites with identified contamination have been remediated to levels where no threat to human health or the environmental remains for the proposed uses.</p>	<p>Less than significant impact with mitigation incorporated.</p>
<p>Impact HAZ-3: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school.</p>	<p>No mitigation is necessary.</p>	<p>Less than significant impact.</p>
<p>Impact HAZ-4: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments could be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, could create a significant hazard to the public or</p>	<p>Implement MM HAZ-2.</p>	<p>Less than significant impact with mitigation incorporated.</p>

Impacts	Mitigation Measures	Level of Significance After Mitigation
the environment.		
Impact HAZ-5: For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, development facilitated by the Housing Element Update, rezonings, and General Plan, and Specific Plan Amendments would not result in a safety hazard or excessive noise for people residing or working the project area.	No mitigation is necessary.	Less than significant impact.
Impact HAZ-6: Development facilitated by the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan.	No mitigation is necessary.	Less than significant impact.
Impact HAZ-7: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not expose people or structures, either directly or indirectly to a significant risk of loss, injury or death involving wildland fires.	No mitigation is necessary.	Less than significant impact.
Section 3.9—Hydrology and Water Quality		
Impact HYD-1: Development consistent with Housing Element Update, rezonings, and General and Specific Plan Amendments would not violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or groundwater quality.	No mitigation is necessary.	Less than significant impact.
Impact HYD-2: Development consistent with the Housing Element Update, rezonings, and General and Specific Plan Amendments would not substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin.	No mitigation is necessary.	Less than significant impact.

Impacts	Mitigation Measures	Level of Significance After Mitigation
<p>Impact HYD-3: Development consistent with the Housing Element Update, rezonings, and General and Specific Plan Amendments would not substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river or through the addition of impervious surfaces, in a manner which would:</p> <ul style="list-style-type: none"> (i) Result in substantial erosion or siltation on- or off-site; (ii) Substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off-site; (iii) Create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff; or (iv) Impede or redirect flood flows? 	<p>No mitigation is necessary.</p>	<p>Less than significant impact.</p>
<p>Impact HYD-4: Development consistent with the Housing Element Update, rezonings, and General and Specific Plan Amendments would not be located in a flood hazard zone, tsunami, or seiche zone, or risk release of pollutants due to project inundation.</p>	<p>No mitigation is necessary.</p>	<p>Less than significant impact.</p>
<p>Impact HYD-5: Development consistent with the Housing Element Update, rezonings, and General and Specific Plan Amendments would not conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan.</p>	<p>No mitigation is necessary.</p>	<p>Less than significant impact.</p>
<p>Section 3.10—Land Use and Planning</p>		
<p>Impact LAND-1: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not physically divide an established community.</p>	<p>No mitigation is necessary.</p>	<p>Less than significant impact.</p>

Impacts	Mitigation Measures	Level of Significance After Mitigation
<p>Impact LAND-2: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not cause a significant environmental impact due to a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect.</p>	<p>No mitigation is necessary.</p>	<p>Less than significant impact.</p>
<p>Section 3.11—Noise</p>		
<p>Impact NOI-1: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments could generate a substantial temporary or permanent increase in ambient noise levels in the vicinity of the potential sites for housing in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies.</p>	<p>MM NOI-1: Stationary Source Noise Impact Reduction Measure Prior to issuance for entitlements for a project, for any development project on potential sites for housing that would include any noise producing mechanical systems located within 25 feet of a property line, the project applicant shall retain a Noise Specialist to conduct a site-specific project-level noise analysis to evaluate compliance with Section 9.04.030 of the Municipal Code, which prohibits noise levels in excess of 60 A-weighted decibel (dBA) at any point outside the property plane. If the analysis identifies that proposed mechanical system operations could result in an exceedance of the City’s noise performance standards, then specific measures to attenuate the noise impact shall be outlined in the analysis. The analysis shall be submitted to the City’s Building and Safety Division for review and approval prior to issuance of building permits. The final noise-reduction measures shall be included on all final construction and building documents and/or construction management plans and submitted for verification to the City. Specific measures may include, but are not limited to, the following measures or design features:</p> <ul style="list-style-type: none"> • The project applicant shall utilize quieter mechanical systems that would not result in an exceedance of the City’s operational noise standards. • The project applicant shall enclose mechanical systems in a sound-attenuating structure or shall install sound barriers adjacent to the proposed system that would reduce operational noise levels to not exceed the City’s noise performance standards as measured at the property line. • The project application shall relocate the proposed mechanical system further from property line to reduce operational noise levels to not exceed the City’s noise performance standards as measured at the property line. 	<p>Less than significant impact with mitigation incorporated.</p>

Impacts	Mitigation Measures	Level of Significance After Mitigation
<p>Impact NOI-2: Development consistent with the Housing Element Update, rezonings, and General and Specific Plan Amendments could result in generation of excessive groundborne vibration or groundborne noise levels.</p>	<p>MM NOI-2: Construction Vibration Reduction Plan</p> <ul style="list-style-type: none"> For any future development projects that would necessitate the use of pile-driving within 200 feet of an off-site structure, prior to the issuance of entitlements for a project, the project sponsor shall retain a Noise Specialist to prepare a Construction Vibration Reduction Plan for submittal to the City’s Planning Director for review and approval that identifies specific techniques, such as the depth and location of temporary trenching, that would reduce potential vibration impacts to less than significant for the impacted structure. Upon approval by the City, the construction vibration reduction measures shall be incorporated into the construction documents. A note shall be provided on grading and building plans indicating that, during grading and construction, the property owner/developer shall be responsible for requiring contractors, to be monitored via on-site inspection by the Community Development Department, to implement these measures to limit construction-related vibration impacts. For any future development projects that would necessitate the use of large vibratory rollers within 30 feet of an off-site structure, or the use of other heavy construction equipment within 15 feet of an off-site structure, the project sponsor shall retain a Noise Specialist to prepare a Construction Vibration Reduction Plan for submittal to the City’s Director of Community Development for review and approval that identifies specific techniques, such as the depth and location of temporary trenching, that would reduce potential vibration impacts to less than significant for the impacted structure. Upon approval by the City, the construction vibration reduction measures shall be incorporated into the construction documents. A note shall be provided on grading and building plans indicating that, during grading and construction, the property owner/developer shall be responsible for requiring contractors, to be monitored via on-site inspection by the Community Development Department, to implement these measures to limit construction-related vibration impacts. 	<p>Less than significant impact with mitigation incorporated.</p>

Impacts	Mitigation Measures	Level of Significance After Mitigation
<p>Impact NOI-3: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not be located within the vicinity of a private airstrip or an airport land use plan and would not expose people residing or working in the project area to excessive noise levels.</p>	<p>No mitigation is necessary.</p>	<p>No impact.</p>
<p>Section 3.12—Population and Housing</p>		
<p>Impact POP-1: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not induce substantial unplanned population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure).</p>	<p>No mitigation is necessary.</p>	<p>Less than significant impact.</p>
<p>Impact POP-2: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere.</p>	<p>No mitigation is necessary.</p>	<p>Less than significant impact.</p>
<p>Section 3.13—Public Services and Recreation</p>		
<p>Impact PSR-1: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not result in substantial adverse physical impacts associated with the provision of new or physically altered fire protection facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for fire protection.</p>	<p>No mitigation is necessary.</p>	<p>Less than significant impact.</p>
<p>Impact PSR-2: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not result in substantial adverse physical impacts associated with the provision of new or</p>	<p>No mitigation is necessary.</p>	<p>Less than significant impact.</p>

Impacts	Mitigation Measures	Level of Significance After Mitigation
physically altered police protection facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for police protection.		
Impact PSR-3: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not result in substantial adverse physical impacts associated with the provision of new or physically altered school facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios or other performance objectives for schools.	No mitigation is necessary.	Less than significant impact.
Impact PSR-4: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not result in substantial adverse physical impacts associated with the provision of new or physically altered library facilities, need for new or physically altered library facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios or other performance objectives for library facilities.	No mitigation is necessary.	Less than significant impact.
Impact PSR-5: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not result in substantial adverse physical impacts associated with the provision of new or physically altered other public facilities, need for new or physically altered other public facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios or other performance objectives for other public facilities.	No mitigation is necessary.	Less than significant impact.
Impact PSR-6: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not increase the use of existing	No mitigation is necessary.	Less than significant impact.

Impacts	Mitigation Measures	Level of Significance After Mitigation
neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated.		
Impact PSR-7: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not include recreational facilities or require the construction or expansion of recreational facilities which might have an adverse physical effect on the environment.	No mitigation is necessary.	Less than significant impact.
Section 3.14—Transportation		
Impact TRANS-1: Development consistent with the Housing Element Update, rezonings, General Plan and Specific Plan Amendments would not conflict with a program plan, ordinance or policy of the circulation system, including transit, roadway, bicycle and pedestrian facilities.	No mitigation is necessary.	Less than significant impact.
Impact TRANS-2: Development consistent with the Housing Element Update, rezonings, and General and Specific Plan Amendments would conflict or be inconsistent with CEQA Guidelines Section 15064.3, subdivision (b).	MM TRANS-2: Implement Vehicle Miles Traveled Reduction Measures. Prior to the issuance of entitlements for a project, project applicants for individual housing project development proposals that do not screen out from Vehicle Miles Traveled (VMT) impact analysis shall provide a quantitative VMT analysis using the methods applied in this Draft Program EIR, with modifications as necessary (e.g., to account for project-specific information and/or to reflect future updates to the Alameda Countywide Travel Demand [Alameda CTC] Model), and reduce VMT impacts to less than the applicable VMT thresholds.	Significant and unavoidable with mitigation.
Impact TRANS-3: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment).	No mitigation is necessary.	Less than significant impact.

Impacts	Mitigation Measures	Level of Significance After Mitigation
Impact TRANS-4: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not result in inadequate emergency access.	No mitigation is necessary.	Less than significant impact.
Section 3.15—Utilities and Service Systems		
Impact UTIL-1: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not require or result in the relocation or construction of new or expanded water, wastewater treatment or stormwater drainage, electric power, natural gas, or telecommunications facilities, the construction or relocation of which could cause significant environmental effects.	No mitigation is necessary.	Less than significant impact.
Impact UTIL-2: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry and multiple dry years.	None available.	Significant and unavoidable.
Impact UTIL-3: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the project’s projected demand in addition to the provider’s existing commitments.	No mitigation is necessary.	Less than significant impact.
Impact UTIL-4: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not generate solid waste in excess of State or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals. In addition, the development consistent with the Housing Element	No mitigation is necessary.	Less than significant impact.

Impacts	Mitigation Measures	Level of Significance After Mitigation
Update would comply with federal, State, and local statutes and regulations related to solid waste.		
Section 3.16—Wildfire		
Impact WILD-1: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not substantially impair an adopted emergency response plan or emergency evacuation plan.	No mitigation is necessary.	Less than significant impact.
Impact WILD-2: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not, due to slope, prevailing winds, and other factors, exacerbate wildfire risks, and thereby expose project occupants to pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire.	No mitigation is necessary.	Less than significant impact.
Impact WILD-3: Development consistent with the Housing Element Update, rezonings, and Specific Plan Amendments would not require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment.	No mitigation is necessary.	Less than significant impact.
Impact WILD-4: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes.	No mitigation is necessary.	Less than significant impact.
Section 3.17—Agriculture and Forestry Resources		
Impact AG-1: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific	No mitigation is necessary.	Less than significant impact.

Impacts	Mitigation Measures	Level of Significance After Mitigation
Plan Amendments would not convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland) as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to nonagricultural use.		
Impact AG-2: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not conflict with existing zoning for agricultural use, or a Williamson Act Contract.	No mitigation is necessary.	Less than significant impact.
Impact AG-3: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code Section 12220(g)), timberland (as defined by Public Resources Code Section 4526), or timberland zoned Timberland Production (as defined by Government Code Section 51104(g)).	No mitigation is necessary.	No impact.
Impact AG-4: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not result in the loss of forest land or conversion of forest land to non-forest use.	No mitigation is necessary.	No impact.
Impact AG-5: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland, to nonagricultural use or conversion of forest land to non-forest use.	No mitigation is necessary.	Less than significant impact.

CHAPTER 1: INTRODUCTION

This Draft Program Environmental Impact Report (Draft Program EIR) is prepared in accordance with the California Environmental Quality Act (CEQA) to evaluate the potential environmental impacts associated with the implementation of the City of Pleasanton 2023-2031 (6th Cycle) Housing Element Update (State Clearinghouse [SCH] No. 2022040091). As described in State CEQA Guidelines Section 15121(a), an EIR is a public information document that assesses the potentially significant environmental impacts of a project. CEQA requires that an EIR be prepared by the agency with primary responsibility over the approval of a project (the lead agency). The City of Pleasanton is the lead agency for the proposed 2023-2031 (6th Cycle) Housing Element Update, rezonings, General Plan and Specific Plan Amendments (collectively referred to herein as the Housing Element Update). Public agencies are charged with the duty to consider and minimize environmental impacts of proposed development where feasible and have the obligation to balance economic, environmental, and social factors.

Pursuant to California Government Code Section 65300 *et seq.*, all cities must prepare a General Plan that institutes policies and standards for future development, housing affordability, and resource protection. State law mandates general plans and the elements therein “. . . comprise an integrated, internally consistent and compatible statement of policies for the adopting agency.”¹ Therefore, when deciding whether to approve a proposed project, the Planning Commission and City Council must determine if, on balance, that project is consistent with the General Plan. The adoption of Housing Element Update would also require General Plan Amendments and Specific Plan Amendments to account for the land use designation changes required for new housing sites.

Pleasanton prepared an inventory of sites that could accommodate the Regional Housing Needs Assessment (RHNA). Based on a preliminary evaluation of the capacity of existing sites zoned for residential development, Pleasanton identified a need for additional locations for future rezoning to allow for residential use, including sites suitable for both lower income and market-rate housing to address the shortfall between the RHNA and the existing capacity for housing within Pleasanton.

Staff presented an initial list of potential housing sites for consideration to the Planning Commission on November 10 and December 15, to the Housing Commission on November 18, and at a Community Meeting on December 1. Based on initial feedback from those meetings, the Planning Commission provided a recommendation to the City Council on a list of potential sites to be considered for future rezoning to allow residential development. On February 1 and 8, 2022, the City Council narrowed down the initial list of sites to 25 sites for inclusion in the environmental analysis and for consideration as part of the Site Inventory for the Housing Element Update. All meeting materials and draft documents are available for public review on the project website at <https://www.pleasantonhousingelement.com>.

¹ California Legislative Information. No date. California Government Code § 65300.5. Website: https://leginfo.ca.gov/faces/codes_displaySection.xhtml?lawCode=GOV§ionNum=65300.5. Accessed: February 8, 2022.

The City is planning for an amount of allowable development under the Housing Element Update to meet the City's RHNA obligation. Each site has been assigned a density range, denoting the minimum and maximum density at which new housing may be built. Housing Element law requires the Housing Element to demonstrate the "realistic capacity" for each site in determining whether adequate sites are available, and, for the purposes of the Housing Element Update's sites inventory, the City has generally taken the approach that sites will develop at a density somewhat less than the maximum allowable in the range. However, recognizing that the zoning will allow for, and some sites could conceivably develop at, the maximum density allowed, to present a conservative analysis of potential environmental impacts, this Draft Program EIR assumes the maximum potential number of residential units on each site, resulting in the analysis of a total of 7,388 units. It should be noted that this provides a conservative analysis with respect to environmental impacts while recognizing that it is unlikely that all the sites would develop at maximum density and actual development capacity would account for factors like site constraints, market fluctuations, and other variables.

Based on realistic development projections, the Housing Element Update anticipates that 93 accessory dwelling units (ADUs) would also be constructed.² Additionally, the Housing Element Update assumes an increased density at the Dublin-Pleasanton Bay Area Rapid Transit (BART) station property, and this Draft Program EIR incorporates analysis of an incremental increase in allowable residential units (306 units). This Draft Program EIR assumes a maximum of 7,787 dwelling units and a maximum of 18,027 new residents.^{3,4,5,6} The final list of approved sites to be adopted by the City Council would be accompanied by the General Plan and Specific Plan Amendments and rezoning actions to accommodate residential housing development, which are analyzed in this Draft Program EIR.

Although the general locations and types of development can be anticipated based on the guidance in the Housing Element Update, until the City receives a development application for subsequent development consistent with the Housing Element Update, the exact locations, types of development, and potential site-specific impacts to the environment are too speculative to be determined. As appropriate, future construction and development plans would be subject to project-level CEQA analysis and potentially additional feasible mitigation, if necessary.

² The ADU estimate is based on the average past 5 years of actual production within Pleasanton, which is consistent with California Department of Housing and Community Development (HCD) guidance. Given that this Draft Program EIR considers the maximum number of units on the potential sites for rezoning, should any of the Housing Element Update policies facilitate the production of ADUs, any additional units over the 93 units would be accounted for within this evaluation because it is unlikely that all of the sites will develop at maximum density.

³ United States Census Bureau. 2019. S2504: Physical Housing Characteristics for Occupied Housing Units. Website: <https://data.census.gov/cedsci/table?q=S2504%3A%20PHYSICAL%20HOUSING%20CHARACTERISTICS%20FOR%20OCCUPIED%20HOUSING%20UNITS&g=1600000US0657792&y=2019&tid=ACSST5Y2019.S2504>. Accessed March 8, 2022.

⁴ United States Census Bureau. 2019. B25124: Tenure By Household Size By Units In Structure. Website: <https://data.census.gov/cedsci/table?q=B25124%3A%20TENURE%20BY%20HOUSEHOLD%20SIZE%20BY%20UNITS%20IN%20STRUCTURE&g=1600000US0657792&tid=ACSDT5Y2019.B25124>. Accessed March 8, 2022.

⁵ United States Census Bureau. 2019. B25033: Total Population in Occupied Housing Units By Tenure By Units In Structure. Website: <https://data.census.gov/cedsci/table?q=population%20BY%20UNITS%20IN%20STRUCTURE&g=1600000US0657792&tid=ACSDT5Y2019.B25033>. Accessed March 8, 2022.

⁶ For Sites 15 and 21b, the low density, 2.99, persons per household factor was utilized because that results in a higher population estimate, which presents a conservative population estimate. For ADUs, the high density, 2.2, persons per household factor was utilized because ADUs are accessory units that, by their nature, house less people. Therefore, given the density classes being evaluated in this Draft Programmatic EIR, the high density persons per household factor is the most reasonable to utilize for ADUs.

1.1 - Purpose of the Program Environmental Impact Report

The City of Pleasanton, as lead agency, determined that the Housing Element Update is a "project" under CEQA. CEQA requires the preparation of an EIR prior to approving any project that may have a significant impact on the environment. For the purposes of CEQA, the term "project" refers to the whole of an action, which has the potential for resulting in a direct physical change or a reasonably foreseeable indirect physical change in the environment (State CEQA Guidelines § 15378(a)).

This Draft Program EIR has been prepared according to CEQA requirements to evaluate the potential environmental impacts associated with the implementation of the Housing Element Update. The purpose of this Draft Program EIR is to inform public agency decision-makers, representatives of affected and responsible agencies, the public, and other interested parties of the potential environmental effects that may result from implementation of the Housing Element Update.

This Draft Program EIR also discusses alternatives to the Housing Element Update and identifies mitigation measures that would offset, minimize, or otherwise avoid potentially significant environmental impacts. This Draft Program EIR is intended to provide decision-makers and the public with information that enables consideration of the environmental consequences of the Housing Element Update and has been prepared in accordance with CEQA (California Public Resources Code [PRC] § 21000, *et seq.*) and the State CEQA Guidelines (California Code of Regulations [CCR] Title 14, Division 6, Chapter 3).

1.2 - Type of Environmental Impact Report

The State CEQA Guidelines identify several types of EIRs, each applicable to different project circumstances. This Draft Program EIR has been prepared as a Program EIR pursuant to State CEQA Guidelines Section 15168. Section 15168 states:

A Program EIR is an EIR that may be prepared on a series of actions that can be characterized as one large project and are related either:

1. Geographically,
2. As logical parts in the chain of contemplated actions,
3. In connection with issuance of rules, regulations, plans or other general criteria to govern the conduct of a continuing program, or
4. As individual activities carried out under the same authorizing statutory or regulatory authority and having generally similar environmental effects which can be mitigated in similar ways.

As a program-level analysis, this Draft Program EIR considers the broad environmental effects of the Housing Element Update. The analysis in this Draft Program EIR does not examine the site-specific effects of individual projects that may occur in the future. Subsequent projects and activities consistent with the Housing Element Update would be examined in light of a certified Final Program EIR. Once the Final Program EIR has been certified, subsequent activities within the program must be

evaluated to determine whether an additional CEQA document needs to be prepared. Many subsequent activities could be found to be within the certified Final Program EIR scope and additional environmental documents may not be required (State CEQA Guidelines § 15168(c)).

Additional environmental review under CEQA may be required for subsequent projects that would have effects not examined in the certified Final Program EIR. That later analysis may tier from the certified Final Program EIR as provided by CEQA and would be generally based on the subsequent project's consistency with the Housing Element Update and the analysis in the certified Final Program EIR, as required under CEQA. It may also be determined that some future projects or infrastructure improvements may be exempt from additional environmental review. When individual subsequent projects or activities are proposed under the Housing Element Update, the lead agency that would approve and/or implement the individual project would examine the projects or activities to determine whether their effects were adequately analyzed in the certified Final Program EIR (see, e.g., State CEQA Guidelines §§ 15152, 15168, and 15183). If the projects or activities would have no effects beyond those disclosed in the certified Final Program EIR, no further CEQA review would be required.

1.3 - Intended Uses of the Draft Program Environmental Impact Report

This Draft Program EIR, and ultimately the Final Program EIR, is intended to evaluate the environmental impacts of the adoption and implementation of the Housing Element Update. The document will serve as a source of information in the review of subsequent planning and development proposals, including subsequent environmental review of development projects, for infrastructure provision and individual development proposals, and for public facilities to serve new development.

The City intends and anticipates that the certified Final Program EIR would be utilized in conjunction with existing streamlining provisions provided by CEQA, emerging streamlining techniques, such as those related to implementation of the Sustainable Communities Strategy (PRC § 21155), and other streamlining procedures, including those that may become available in the future. To promote the effective use of City resources, the analysis in this Draft Program EIR may be considered the first tier of environmental review and it is the intent of the City that future, project-specific and/or site-specific CEQA documents may utilize this analysis as appropriate. Tiering refers to a multilevel approach to preparing environmental documents that is codified in Public Resources Code Section 21083.3 and State CEQA Guidelines Section 15152.

1.4 - Agencies and Approvals

The term "Responsible Agency" includes all public agencies other than the lead agency that have discretionary approval power over a project or an aspect of a project (State CEQA Guidelines § 15381). For CEQA, a "Trustee" agency has jurisdiction by law over natural resources that are held in trust for the people of the State of California (State CEQA Guidelines § 15386). Because the California Department of Housing and Community Development (HCD) would review the Housing Element Update prior to its adoption and certify the Housing Element Update after the City adopts it, HCD would serve as a Responsible Agency pursuant to CEQA. While there are no Trustee Agencies

responsible for approvals associated with adoption of the Housing Element Update, subsequent projects and other actions to support implementation of the Housing Element Update would require actions, including permits and approvals, by Trustee and Responsible Agencies that may include, but are not necessarily limited to:

Federal

- United States Fish and Wildlife Service
- United States Army Corps of Engineers

State

- California Department of Fish and Wildlife
- California Department of Housing and Community Development
- California Department of Transportation

Regional

- Alameda County Airport Land Use Commission
- Alameda County Local Agency Formation Commission
- Alameda County Office of Education
- Bay Area Air Quality Management District
- Bay Area Rapid Transit District
- Dublin-San Ramon Services District
- East Bay Regional Parks District
- Livermore-Pleasanton Fire Department
- San Francisco Regional Water Quality Control Board
- Zone 7 Water Agency

Local

- Pleasanton Unified School District

1.5 - Environmental Review Process

The review and certification process for this Draft Program EIR has involved, or will involve, the general procedural steps described below.

1.5.1 - Notice of Preparation

In accordance with State CEQA Guidelines Section 15082, the City circulated a Notice of Preparation (NOP) of a Program EIR for the Housing Element Update on April 6, 2022, to Trustee and Responsible Agencies, the SCH, and the public. The 30-day public review period ended on May 5, 2022. A Scoping Meeting was held on April 13, 2022. The NOP and all comment letters received on the NOP are presented in Appendix A.

The City received four comment letters on the NOP and no public comments at the Scoping Meeting. Copies of these four letters are provided in Appendix A of this Draft Program EIR.

Native American Heritage Commission (April 15, 2022)

- Provides a summary of Assembly Bill 52 and Senate Bill 18 regarding the requirements of tribal consultation.
- Provides examples or appropriate mitigation measures, if applicable.
- Provides recommendations for cultural resource assessment and the necessary steps to follow in order to fully determine the existence and significance of tribal cultural resources.

James Paxson (April 27, 2022)

- Recommends densification for BART and Oracle sites as well as other sites within the Hacienda Business Park.
- Recommends the Draft Program EIR conduct a buildout analysis that considers development of office that is not currently entitled.
- Recommends reasonable assumptions are made to consider both near-term and long-term development within Pleasanton.

California Department of Toxic Substances Control (May 5, 2022)

- States that Site 1 and Site 22 are in areas with previously detected volatile organic chemicals and organochlorine pesticides in soils and groundwater.
- States that the potential for historic or future activities on or near potential sites for housing may result in the release of hazardous wastes/substances.
- Recommends surveys and soil sampling be prepared for potentially hazardous materials such as aerially deposited lead, lead based paints or products, mercury, asbestos containing materials, polychlorinated biphenyl caulk, and organochlorinated pesticides.

Perkins Coie, on Behalf of Simon Property Group (May 5, 2022)

- Recommends that the Draft Program EIR specifically identify development parameters for Site 2.
- Recommends that the Draft Program EIR include the possibility that density bonus units could be developed.
- Recommends that the Draft Program EIR evaluate parking associated with housing on the potential sites for housing.
- States that the Draft Program EIR include a description of affordability levels for each parcel and address feasible mitigation in light of the economic consequences of the housing inventory.

- States that for sites carried over from the 5th Cycle Housing Element, the Project Description indicate a zoning district that would allow residential units by right for developers who choose to include 20 percent affordable units, pursuant to Government Code Section 65583.2(c).
- States that the Draft Program EIR should include a detailed (as opposed to conceptual) analysis.

1.5.2 - Public Notice/Public Review

Upon completion of the Draft Program EIR for the Housing Element Update, the City will file a Notice of Completion (NOC) with the SCH of the Governor's Office of Planning and Research to begin the public review period (PRC § 21161).

Concurrent with the NOC, the City will provide a public notice of availability for the Draft Program EIR and invite comments from the public, agencies, organizations, and other interested parties. Consistent with CEQA requirements, the review period for this Draft Program EIR will be no less than 45 days. Public comments on the Draft Program EIR will be accepted in written form. All comments or questions regarding the Draft Program EIR should be addressed to:

Megan Campbell, Associate Planner
City of Pleasanton
Community Development Department
Post Office Box 520
Pleasanton, CA 94566
Phone: 925.931.5610
Fax: 925.931.5483
Email: mcampbell@cityofpleasantonca.gov

In addition, the City will consider the Draft Program EIR at one or more public hearings before the Planning Commission and/or City Council. The public will have an opportunity to provide verbal comments on the Draft Program EIR during public hearings. Notice of public hearings will be posted on the City's website, in the local newspaper, and through direct mailing and emailing to interested parties that have requested notification.

1.5.3 - Response To Comments on the Draft Program EIR/Final Program EIR

Following the public review period on the Draft Program EIR, a Final Program EIR will be prepared. The Final Program EIR will respond to written comments regarding environmental issues received during the public review period and to oral comments made at public hearings. The Final Program EIR may also include corrections, clarifications, and additional explanatory information that is being added to the Draft Program EIR.

1.5.4 - Certification of the Final Program EIR/Project Consideration

The City Council is the decision-making body on the Housing Element Update and the Draft Program EIR. If the City Council finds that the Final Program EIR is "adequate and complete," they may certify the Final Program EIR in accordance with State CEQA Guidelines. As set forth by State CEQA Guidelines Section 15151, the standards of adequacy require an EIR to provide a sufficient degree of

analysis to allow decisions to be made regarding a proposed project that take account of environmental consequences.

Upon review and consideration of the Final Program EIR, the City Council may take action to approve, revise, or reject the Housing Element Update. A decision to approve, for which this Draft Program EIR identifies significant environmental effects, must be accompanied by written findings in accordance with State CEQA Guidelines Sections 15091 and 15093. A Mitigation Monitoring and Reporting Program (MMRP) would also need to be adopted in accordance with Public Resources Code Section 21081.6(a) and State CEQA Guidelines Section 15097. The MMRP will list all mitigation measures that have been incorporated into or imposed upon the Housing Element Update to reduce or avoid significant effects on the environment. The MMRP will be designed to ensure that these measures are carried out during project implementation in a manner consistent with the Final Program EIR.

1.6 - Organization and Scope

State CEQA Guidelines Sections 15122-15132 identify the content requirements for Draft and Final EIRs. An EIR must include a description of the environmental setting, an environmental impact analysis, mitigation measures, alternatives, significant irreversible environmental changes, growth-inducing impacts, and cumulative impacts. The environmental issues addressed in the Draft Program EIR were established through review of environmental and planning documentation developed for the Housing Element Update, environmental and planning documentation prepared for recent projects located within the City of Pleasanton, and responses to the NOP and Public Scoping Meeting comments.

This Draft Program EIR is organized in the following manner:

Executive Summary

The Executive Summary summarizes the characteristics of the Housing Element Update, known areas of interest, and issues to be resolved, as well as provides a concise summary matrix of the environmental impacts and mitigation measures consistent with State CEQA Guidelines Section 15123.

Chapter 1—Introduction

This chapter briefly describes the Housing Element Update and the purpose of the environmental evaluation, identifies the lead, trustee, and responsible agencies, summarizes the process associated with preparation and certification of an EIR, identifies the scope and organization of the Draft Program EIR, and summarizes comments received on the NOP.

Chapter 2—Project Description

This chapter provides a detailed description of the Housing Element Update, including a general overview of the Housing Element Update process, project proponent, regional location and planning area, objectives, and characteristics of the Housing Element Update, including required discretionary approvals.

Chapter 3–Environmental Impact Analysis

This chapter contains the analysis of environmental topic areas as identified below. Each section contains a description of the existing environment as it pertains to the topical area as well as a description of the regulatory environment that may be applicable to the Housing Element Update. Each section also identifies thresholds of significance by which impacts are determined, a description of project-related impacts associated with the environmental topic, identification of appropriate mitigation measures, and a conclusion as to the significance of each impact.

Appendix G to the State CEQA Guidelines provides a sample environmental checklist that includes questions for determining whether impacts to environmental resources are potentially significant. These questions reflect the input of planning and environmental professionals at the Governor’s Office of Planning and Research (OPR) and the California Natural Resources Agency, based on input from stakeholder groups and experts in various other governmental agencies, nonprofits, and leading environmental consulting firms. They also reflect the requirements of laws other than CEQA that protect environmental resources (e.g., the federal Clean Water Act, the Porter-Cologne Water Quality Control Act, the federal Endangered Species Act and California Endangered Species Act [CESA]). As a result, many lead agencies derive their significance criteria from the questions posed in Appendix G. The City, in its discretion as lead agency, has chosen to utilize the questions in Appendix G to the State CEQA Guidelines for determining potential impacts associated with development consistent with implementation of the Housing Element Update.

The following environmental topics are addressed in this chapter:

- Aesthetics, Light, and Glare
- Air Quality
- Agriculture and Forestry Resources
- Biological Resources
- Cultural and Tribal Cultural Resources
- Energy
- Geology and Soils
- Greenhouse Gas Emissions
- Hazards and Hazardous Materials
- Hydrology and Water Quality
- Land Use and Planning
- Noise
- Population and Housing
- Public Services and Recreation
- Transportation
- Utilities and Service Systems
- Wildfire

Chapter 4–Effects Found not to be Significant

It was determined that the Housing Element Update would result in no impact to mineral resources. Other environmental impacts with no impact are addressed in various topical sections in the Program EIR. This chapter analyzes potential impacts resulting from any known significant mineral occurrences.

Given the location of the City in the urbanized context of the San Francisco Bay Area and the lack of mineral resources in the area, impacts to these resources are anticipated to be less than significant.

Chapter 5—Other CEQA Considerations

This chapter evaluates and describes the following CEQA required topics: significant and unavoidable impacts, growth-inducing impacts, and significant irreversible environmental changes.

Chapter 6—Alternatives to the Housing Element Update

This chapter provides a comparative analysis of the Housing Element Update and the selected alternatives, including the mandatory “No Project” alternative. State CEQA Guidelines Section 15126.6 requires that an EIR describe a range of reasonable alternatives to a proposed project, which could feasibly attain the basic objectives of a project and avoid and/or lessen any significant environmental effects of a project.

Chapter 7—Persons and Organizations Consulted-List of Preparers

This chapter lists all authors and agencies that assisted in the preparation of the Draft Program EIR, by name, title, and company or agency affiliation.

Appendices

The Draft Program EIR appendices includes all notices and other procedural documents pertinent to the Draft Program EIR, as well as technical material prepared to support the analysis.

CHAPTER 2: PROJECT DESCRIPTION

This Draft Program Environmental Impact Report (Draft Program EIR) analyzes the potential environmental effects of the proposed 2023-2031 (6th Cycle) Housing Element Update, rezonings, General Plan and Specific Plan Amendments (collectively referred to herein as the Housing Element Update), and this chapter describes the Housing Element Update.

2.1 - Background

California Government Code Section 65302(c) mandates that each city shall include a Housing Element in its General Plan. The Housing Element is required to identify and analyze existing and projected housing needs and include statements of the city's goals, policies, quantified objectives, and scheduled programs for the preservation, improvement, and development of housing. The City of Pleasanton (City), in adopting its Housing Element, must consider economic, environmental, and fiscal factors, as well as community goals as set forth in the City of Pleasanton General Plan (General Plan), in compliance with California Government Code Section 65580, *et seq.*

2.2 - Project Location and Setting

2.2.1 - Project Location

Pleasanton is located in Alameda County, California, one of the nine Bay Area counties bordering the San Francisco Bay (Exhibit 2-1) and is generally bound to the west by Pleasanton Ridgeland; to the north by Interstate 580 (I-580) and the City of Dublin; to the east by unincorporated land, including existing and former quarry lands, and by the City of Livermore; and to the south by the San Francisco Water Department lands. Interstate 680 (I-680) runs north to south and bisects the western portion of the City.

The Pleasanton Sphere of Influence (SOI), which signifies the probable ultimate physical boundary and service area (Exhibit 2-2), includes 42.2 square miles (27,200 acres). The SOI has been adopted by the Alameda County Local Agency Formation Commission (LAFCo). The SOI includes lands incorporated within the city limits and unincorporated land, over which Alameda County has zoning and land use authority.

Pleasanton has identified a total of 25 sites for potential rezoning, listed in Table 2-1 and in Exhibit 2-2. All these sites, aside from Sites 1 and 22, are located within the incorporated area. Site 22 is just outside of the city limits but within Pleasanton's SOI and Urban Growth Boundary. Site 1 is also located just outside of the city limit, however, the western half of Site 1 is also located just outside the Urban Growth Boundary (UGB) (Exhibit 2-2). This Draft Program EIR focuses on the sites identified in the Housing Element Update that could potentially be zoned for residential use (referred to as the "potential sites for rezoning" or "rezoning sites").

Table 2-1: Potential Sites for Rezoning

Site No.	Name	Density	APN	Existing Uses	Existing General Plan Land Use Designation	Existing Zoning Designation	Location	Total Acres	Buildable Acres	Density Range (du/ac)		Maximum Capacity
1	Lester	Low	941 250000200, 941 250000300, 941 260000206, 941 270000200	Vacant	LDR, A, PHS	Prezoned–A Unincorporated Alameda County	10807 and 11033 Dublin Canyon Road	128.50	12.90	2	2	31
2	Stoneridge Shopping Center (Mall)	High	941 120109200, 941 120109500, 941 120109403, 941 120102800, 941 120102900, 941 120103006	Underutilized– parking lot	C, MU	CR-(m) District and PUD-MU District	1008, 1300, 1400, 1500, 1600, and 1700 Stoneridge Mall Road	64.82	18.00	50	80	1,440
3	PUSD–Donlon ¹	Low	941 130800700	Vacant–surplus portion of Donlon School site	PI	R-1-65 District	4150 Dorman Road	19.00	5.50	5	5	28
4	Owens (Motel 6 and Tommy T)	High	941 130101303, 941 130104701	Underutilized–two parcels; currently developed with commercial uses (hotel and restaurant) and parking	C	C-F District	5102-5102 Hopyard Road	2.36	2.36	30	40	94
5	Laborer Council	High	941 277103300	Underutilized– developed with existing office building and parking	MU, BP	PUD-I/C-O District	4780 Chabot Drive	1.39	1.36	30	40	54

¹ On July 19, 2022, the City Council considered the Draft Housing Element and authorized its submittal to HCD for the Department’s mandated review. Prior to that meeting, Pleasanton Unified School District requested that the Donlon Site be removed from consideration from re-zoning, and the City Council agreed to remove the site from the Draft Housing Element. However, since the technical analysis for this Draft Program EIR was substantially complete by that time, this Draft Program EIR continues to reflect the Donlon site, resulting in a marginally more conservative analysis.

Site No.	Name	Density	APN	Existing Uses	Existing General Plan Land Use Designation	Existing Zoning Designation	Location	Total Acres	Buildable Acres	Density Range (du/ac)		Maximum Capacity
6	Signature Center	High	941 130105700, 941 130105800, 941 130105900, 941 130106001	Underutilized—developed with existing office buildings and parking structure.	BP	PUD-I/C-O District	4900-5000 Hopyard Road	14.38	11.00	30	40	440
7	Hacienda Terrace	High	941 276100403	Underutilized—developed with existing office building; housing site is 2-acre portion of existing parking lot	MU, BP	PUD-I/C-O District	4309 Hacienda Drive	16.37	2.00	30	40	80
8	Muslim Community Center	Medium	941 276201301	Underutilized—developed with existing office building	MU, BP, Wildland Overlay	PUD-I/C-O District	5724 W Las Positas Boulevard	5.00	5.00	15	25	125
9	Metro 580	High	941 277900900	Underutilized—developed with existing commercial/retail uses (Kohl’s, Party City) and parking; housing site is the 5-acre portion of excess parking	MU, BP	PUD-I/C-O District	4515-4575 Rosewood Drive	15.52	5.00	45	75	375
11	Old Santa Rita Area	High	941 283000100, 941 283000200, 941 283000300, 941 283000400, 941 283000500, 941 283000600,	Underutilized—approximately 20 parcels, developed with a variety of low-intensity service	C, Wildland Overlay	C-S, PUD-C-O, PUD-O, PUD-C-S, PUD-C, PUD-C-C	3534-3956 Old Santa Rita Road	21.85	21.85	30	60	1,311

Site No.	Name	Density	APN	Existing Uses	Existing General Plan Land Use Designation	Existing Zoning Designation	Location	Total Acres	Buildable Acres	Density Range (du/ac)	Maximum Capacity
			941 283000700, 941 283000800, 941 283002800, 941 283002900, 941 283001100, 941 283001200, 941 283001300, 941 283001400, 941 283001500, 941 283001600, 941 283001700, 941 283001800, 941 283001900, 941 283002000, 941 283002100, 941 283002200, 941 283002300, 941 283002400, 941 283002500, 941 283002600, 941 283002700, 946 110000203, 946 110000300, 946 110000400, 946 110000500, 946 110000600, 946 110000800, 946 110000900, 946 110001000, 946 110001100, 946 110001200, 946 110001402, 946 110001701,	commercial and light industrial uses							

Site No.	Name	Density	APN	Existing Uses	Existing General Plan Land Use Designation	Existing Zoning Designation	Location	Total Acres	Buildable Acres	Density Range (du/ac)		Maximum Capacity
			946 110002900, 946 110003000, 946 110003103, 946 320000205.									
12	Pimlico Area (North side)	High	946 110103102, 946 110103502, 946 110103604	Underutilized—developed with existing commercial uses (car wash, car rental)	C	PUD-C District and C-F District	4003-4011 Pimlico Drive	2.12	2.12	30	40	85
14	St. Elizabeth Seton	Medium	946 455001704	Vacant—adjacent to 4001 Stoneridge Drive	MDR	A District	4001 Stoneridge Drive	2.85	2.85	12	18	51
15	Rheem Drive Area (southwest side)	Low/ Medium	946-455000700, 946-455000800, 946-455001001, 946-455001100, 946-455001200, 946-455001300, 946-455001400, 946-455002700, 946-455002800, 946-455002900, 946-455003000, 946-455003100	Underutilized—11 parcels, developed with light industrial/service commercial uses	I	PUD-I District	2110-2182 Rheem Drive	9.77	9.77	8	14	137
16	Tri-Valley Inn	Medium	946 329500104	Underutilized—34-room motel and surface parking	C	C-F District	2025 Santa Rita Road	2.47	2.47	15	25	62
18	Valley Plaza	High	946 329500900, 946 329500202, 946 32950306,	Underutilized—eight parcels under separate ownership;	C	PUD-C District	1803-1811 Santa Rita Road and	7.33	5.50	30	40	220

Site No.	Name	Density	APN	Existing Uses	Existing General Plan Land Use Designation	Existing Zoning Designation	Location	Total Acres	Buildable Acres	Density Range (du/ac)		Maximum Capacity
			946 329500600, 946 329500700, 946 329501000, 946 329501100, 946 329501200, 946 329501300	developed with multi-tenant commercial center, stand-alone fast-food restaurants and parking			4301-4307 Valley Avenue					
19	Black Avenue	Medium	946 338000600	Underutilized–vacant office building and parking	PI	P District	4400 Black Avenue	2.59	2.59	15	25	65
20	Boulder Court	High	946 125101300, 946 125010000	Underutilized–two parcels, occupied by construction contractor and concrete mix supplier	I	I-G-40 District	3400 and 3500 Boulder Street	9.45	9.45	30	40	378
21a	Kiewit	High	946 125100704, 946 125100809, 946 125103300.	Vacant–short-term lease for outdoor storage yard for crane equipment company	Various*	I-G-40 District	3300 Busch Road	50.40	5.00	30	40	200
21b	Kiewit	Low/ Medium	946 125100704, 946 125100809, 946 125103300.	Vacant–short-term lease for outdoor storage yard	Various*	I-G-40 District; S District	3300 Busch Road	50.40	40.00	8	14	560
22	Merritt	Low	941 095000301, 941 095000303, 941 095000311, 941 095000312.	Vacant	LDR	Unincorporated Alameda County	4131 and 4141 Foothill Road	45.59	45.59	2	2	91
23	Sunol Boulevard	High	947 000400105, 947 000400107, 947 000400214,	Underutilized–five parcels, developed with hardware	I	I-P District	5505-5675 Sunol Boulevard	23.89	23.89	30	40	956

Site No.	Name	Density	APN	Existing Uses	Existing General Plan Land Use Designation	Existing Zoning Designation	Location	Total Acres	Buildable Acres	Density Range (du/ac)		Maximum Capacity
			947 000400304, 947 000400400.	store/lumber yard, public storage, and warehouse/ distribution								
24	Sonoma Drive Area	Medium	948 000900100, 948 000900200, 948 000900300, 948 000900401, 948 000900600, 948 000900900, 948 000901000, 948 000901100, 948 000901200, 948 000901300, 948 000901600, 948 000901700	Underutilized/ vacant—12 parcels; two vacant with remainder developed with low- intensity commercial uses and parking	I	I-P District	5674-5791 Sunol Boulevard and 5600 Sunol Boulevard	6.51	6.51	15	25	163
25	PUSD—District	Medium	094 000100103	Underutilized— occupied with PUSD administrative office, preschool, and maintenance yard; PUSD seeking to re-locate facilities	PI	P District	4750 First Street	10.17	10.17	8	16	163
26	St. Augustine	Low	946 255001401	Vacant	PI	A District	3949 Bernal Avenue	6.31	4.15	2	7	29
27	PUSD—Vineyard	Low	946 461900100	Vacant	PI	PUD-School District	Vineyard Avenue between Thiessen Street and Manoir Lane	10.30	5.00	3	5	25

Site No.	Name	Density	APN	Existing Uses	Existing General Plan Land Use Designation	Existing Zoning Designation	Location	Total Acres	Buildable Acres	Density Range (du/ac)	Maximum Capacity
29	Oracle	High	941 277800305	Vacant-surplus portion of Oracle campus site	MU, BP	PUD-I/C-O District	5805 Owens	20.44	3.00	45 75	225
Total											7,388

Notes:

High-density sites are denoted with purple shading background and the medium-and low-density sites are denoted with the green shading background.

* The General Plan land use map depicts multiple potential land uses within the entire East Pleasanton area, which includes the Sites 21a and 21b. Program 6.1 of the General Plan indicates that allowable uses in this area are to be considered through a Specific Plan process.

Source: City of Pleasanton 2022.

General Plan Land Use Designations				Zoning District			
LDR	Residential-Low Density	ICO	Industrial/Commercial/Office	A	Agriculture District	MU	Mixed Use District
MDR	Residential-Medium Density	I	General and Limited Industrial	R-1-65	One-Family Residential District, 6,500 square feet minimum lot size	I	Industrial District
HDR	Residential-High Density	MU	Mixed Use	RM	Multi-Family Residential Districts	I/C-O	Industrial/Commercial Office District
C	Retail/Highway/Service Commercial/Business and Professional Offices	CF	Community Facilities	C	Commercial District	I-P	Industrial-Park District
BP	Business Park	PI	Public and Institutional	C-C	Central Commercial District	I-G-40	General Industrial District, 40,000 square feet minimum lot size
		A	Agriculture and Grazing	C-S	Services Commercial District	Q	Rock, Sand and Gravel Extraction District
		OS	Open Space	C-F	Freeway Interchange Commercial District	P	Public and Institutional District
		PHS	Public Health and Safety	CR-(m)	Regional Commercial District (mall)	PUD	Planned Unit Development District
		PR	Parks and Recreation	O	Office District	LDR	Low Density Residential District
						MDR	Medium Density Residential District
						HDR	High Density Residential District
						OS	Open Space District
						S	Study District

2.2.2 - Existing Housing

In 2020, Pleasanton had a population of 78,371 persons² and approximately 28,602 housing units consisting mostly of attached and detached single-family homes, which make up close to 70 percent of all units.³ Table 2-2 provides existing housing units by type for 2011 and 2021.

Table 2-2: Existing Housing Units by Type, 2011 and 2021

Unit Type	2011			2021		
	Number	Percent ¹	Vacancy Rate	Number	Percent ¹	Vacancy Rate
Single Detached	16,750	63.9 percent	—	17,295	60.0 percent	—
Single Attached	2,615	9.9 percent		2,752	9.6 percent	
Two to Four	1,601	6.1 percent		1,619	5.6 percent	
Five Plus	4,723	18.0 percent		6,556	22.8 percent	
Mobile Homes and Other	380	1.5 percent		380	1.3 percent	
ADUs ²	137	0.5 percent	—	208	0.7 percent	—
Total	26,206	99.9 percent	3.1 percent	28,810	100 percent	4.6 percent

Notes:
¹ Rounded to the nearest tenth of a percent
² Estimated based on available permit and other data
Sources: California Department of Finance. 2021. E-5 Population and Housing Estimates for Cities, Counties, and the State, 2011-2021 with 2010 Census Benchmark. Website: <https://www.dof.ca.gov/forecasting/demographics/estimates/e-1/>. Accessed January 26, 2022.
City of Pleasanton 2022.

2.2.3 - Existing Housing Element

The City of Pleasanton 2015-2023 (5th Cycle) Housing Element was adopted by the City Council on January 6, 2015, pursuant to an Addendum to the certified Supplemental Environmental Impact Report for the City of Pleasanton Housing Element and Climate Action Plan General Plan Amendment and Rezonings (the Supplemental EIR for the 4th Cycle Housing Element, State Clearinghouse [SCH] No. 2011052002).

On January 4, 2012, the City adopted the 4th Cycle Housing Element and certified the Supplemental Environmental Impact Report for the City of Pleasanton Housing Element and Climate Action Plan

² California Department of Finance. 2021. Tables of January 2021 City Population Rankings, Table 1-CityTotalPop2021. Website: <https://www.dof.ca.gov/forecasting/demographics/estimates/e-1/>. Accessed January 26, 2022.

³ California Department of Finance. 2021. E-5 Population and Housing Estimates for Cities, Counties, and the State, 2011-2021 with 2010 Census Benchmark. Website: <https://www.dof.ca.gov/forecasting/demographics/estimates/e-1/>. Accessed January 26, 2022.

General Plan Amendment and Rezoning and the associated Mitigation Monitoring and Reporting Program (MMRP) (Resolution No. 12-492). Resolution No. 12-492, which includes the MMRP, are provided in Appendix B.

The City of Pleasanton 2015-2023 (5th Cycle) Housing Element adequately addressed the 2015-2023 Regional Housing Needs Allocation (RHNA) of 2,067 units, as shown in Table 2-3.

Table 2-3: Pleasanton’s 2015-2023 Regional Housing Needs Allocation

RHNA	Number of Units– Very Low Income (<50 percent of Area Median Income)	Number of Units– Low Income (50- 80 percent of Area Median Income)	Number of Units– Moderate Income (80-120 percent of Area Median Income)	Number of Units– Above Moderate Income (>120 percent of Area Median Income)	Total
Pleasanton	716	391	407	553	2,067
Notes: RHNA = Regional Housing Needs Allocation Source: Association of Bay Area Governments (ABAG). 2013. Final Regional Housing Needs Allocation Plan: San Francisco Bay Area, 2015-2023.					

2.3 - Housing Element

2.3.1 - Purpose of a Housing Element

State law dictates that each city and county in California evaluate local housing needs and, as part of the Housing Element, prepare a realistic set of policies and programs to fulfill those needs in conjunction with the local government’s long range General Plan. Each city and county must maintain a General Plan as a guide for the physical development of the community. This required evaluation of housing needs and resulting program and policies is included as the “Housing Element” of a local government’s General Plan.

Housing Element Law mandates that local governments must appropriately plan to meet the existing and projected housing needs of all economic segments of the community, from very low income (less than 50 percent of Area Median Income [AMI]) to above moderate income (above 120 percent of AMI). The law recognizes that local governments must adopt land use plans and regulatory systems to provide opportunities for housing production to support the private market in adequately addressing housing needs and demands. The law also requires that the California Department of Housing and Community Development (HCD) review local housing elements to ensure compliance with state law and report their findings to local governments. Although the Housing Element provides policies and programs to facilitate new housing construction, the Housing Element does not propose any specific development projects, nor is the City of Pleasanton required to construct any particular project.

Each city and county in the State of California is required to prepare regular updates of the Housing Element. Each jurisdiction within the Bay Area Region, which includes Pleasanton, must prepare an updated Housing Element for the sixth planning cycle, which covers the 2023–2031 period.

2.3.2 - Regional Housing Needs Assessment

One important aspect of Housing Element updates is the identification of housing growth needs and a jurisdiction's capacity to accommodate that growth based on available sites for residential development. This process is referred to as the RHNA. At the beginning of each new housing element planning period, HCD determines the total regional housing need. The Association of Bay Area Governments (ABAG) then determines the amount of new housing needed for each income group within each Bay Area jurisdiction, based on a methodology developed by ABAG and approved by HCD. HCD determined that the nine-county Bay Area region would need 441,176 additional housing units between 2023 and 2031 to accommodate projected household growth.⁴

Each Bay Area city's share of the regional housing need is based on a plan, prepared by ABAG, entitled the Final RHNA Plan: San Francisco Bay Area, 2023-2031, (RHNA Plan) which was adopted by ABAG in December 2021 and approved by HCD in January 2022.

In preparing the RHNA Plan, the methodology was guided by the following objectives, set forth in State law and paraphrased below:

- **Objective 1:** Increase housing supply and mixes of housing types, tenure, and affordability in all cities and counties in an equitable manner.
- **Objective 2:** Promote infill development and socioeconomic equity, protect environmental and agricultural resources, encourage efficient development patterns, and achieve greenhouse gas emissions reduction targets.
- **Objective 3:** Promote improved intraregional job-housing relationship, including balance between low-wage jobs and affordable housing.
- **Objective 4:** Balance disproportionate housing income distributions (more high-income RNHA to lower-income areas and vice versa).
- **Objective 5:** Affirmatively further fair housing.

Housing Element law mandates the RHNA methodology achieve the above five statutory objectives and consistency with the forecasted development pattern included in the Plan Bay Area 2050 Final Blueprint (Final Blueprint) adopted by in October 2021 by ABAG and the Metropolitan Transportation Commission (MTC). The final RHNA methodology includes three primary components: (1) baseline allocation, (2) factors and weights, and (3) equity adjustment; the equity adjustment was incorporated as part of the draft RHNA methodology approved in January 2021.

The baseline allocation correlates to each jurisdiction's percentage of the region's total households in the year 2050 as set forth in the Final Blueprint, which takes into consideration the number of households currently living in a jurisdiction and the number of households expected to be added within the next several decades. With respect to factors and weights, each factor represents data

⁴ Association of Bay Area Governments (ABAG). 2021. Final Regional Housing Needs Allocation (RHNA) Plan: San Francisco Bay Area, 2023-2031, Table 1: ABAG Regional Housing Needs Determination from HCD. Website: https://abag.ca.gov/sites/default/files/documents/2021-12/Final_RHNA_Allocation_Report_2023-2031-approved_0.pdf. Accessed: January 24, 2022/

related to policy priorities set forth in the final RHNA methodology, including access to high opportunity areas and proximity to jobs and transit, and the weight determines the share of a region’s housing needs assigned by that particular factor. The equity adjustment established 49 jurisdictions that exhibit racial and socioeconomic demographics differing from the regional average utilizing a composite score developed by the Housing Methodology Committee. It is intended to ensure that each of these 49 jurisdictions receives an allocation of lower-income units that is at least proportional to its share of the region’s total households in 2020. Pleasanton was not among the 49 jurisdictions, and as a result the equity adjustment did not affect the City’s RHNA.

The final RHNA for Pleasanton is provided in Table 2-4.

Table 2-4: 2023-2031 Regional Housing Needs Allocation for Pleasanton

RHNA	Income Category				Total
	Number of Units– Very Low Income (<50 percent of Area Median Income)	Number of Units– Low Income (50- 80 percent of Area Median Income)	Number of Units– Moderate Income (80-120 percent of Area Median Income)	Number of Units– Above Moderate Income (>120 percent of Area Median Income)	
Pleasanton	1,750	1,008	894	2,313	5,965

Source: Association of Bay Area Governments (ABAG). 2021. Final Regional Housing Needs Allocation (RHNA) Plan: San Francisco Bay Area, 2023-2031, Table 4: Final RHNA Allocations.

2.3.3 - Relationship of the Housing Element to the General Plan

Pursuant to California Government Code Section 65300 *et seq.*, all cities must prepare a General Plan that institutes policies and standards for future development, housing affordability, and resource protection. State law mandates general plans and the elements therein “ . . . comprise an integrated, internally consistent and compatible statement of policies for the adopting agency.”⁵ Therefore, when deciding whether to approve a proposed project, the Planning Commission and City Council must determine if, on balance, that project is consistent with the General Plan. The adoption of Housing Element Update would also require General Plan Amendments and Specific Plan Amendments to account for the land use designation changes required for new housing sites. These amendments are described in more detail below.

2.3.4 - Housing Needs Allocation

The housing needs allocation portion of the Housing Element Update includes housing needs based on the current (2023-2031) RHNA and the remaining unmet need from the 2015-2023 (5th Cycle) Housing Element, minus the residential units approved or developed since the beginning of the planning period, and what units would be developed on any vacant land currently designated for residential development. Based on a preliminary evaluation of the capacity of existing sites zoned for residential development, there is a need to identify additional locations for future rezoning to allow

⁵ California Legislative Information. No date. California Government Code § 65300.5. Website: https://leginfo.ca.gov/faces/codes_displaySection.xhtml?lawCode=GOV§ionNum=65300.5. Accessed: February 8, 2022.

for residential use, including sites suitable for both lower-income and market-rate housing to address the shortfall between the RHNA and the existing capacity. Table 2-5 summarizes the estimate of existing zoned capacity, and the shortfall relative to the RHNA is presented in Table 2-4. The table includes “carryover” sites from the 2015-2023 (5th Cycle) Housing Element, which are sites that were rezoned in a prior Housing Element but have not yet developed as well as “pipeline” projects, which are those that are entitled for residential development and where construction is either underway or pending. See Table 2-6 and Table 2-7 for a summary of carryover and pipeline sites, respectively.

Among the carryover sites is the Dublin-Pleasanton Bay Area Rapid Transit (BART) station property (shown in Figure 2-1), which included zoning for a density of 30-35 units per acre in the 2015-2023 (5th Cycle) Housing Element. The Dublin-Pleasanton BART station property was analyzed in the Supplemental Environmental Impact Report for the City of Pleasanton Housing Element and Climate Action Plan General Plan Amendment and Rezonings (SCH No. 2011052002). In 2018, Assembly Bill (AB) 2923 was adopted by the State, which established new minimum zoning standards for BART-owned properties, including a minimum density of 75 dwelling unit/acre (du/acre) for the Dublin-Pleasanton BART station property. Though the Dublin-Pleasanton BART station property is not included as a potential site for rezoning, the Housing Element Update assumes this increased density and this Draft Program EIR incorporates analysis of an incremental increase in allowable residential units (306 units)⁶ and associated population over that previously analyzed in the Supplemental Environmental Impact Report for the City of Pleasanton Housing Element and Climate Action Plan General Plan Amendment and Rezonings. Where applicable, potential environmental impacts associated with the incremental increase in allowable units are analyzed in this Draft Program EIR. Potential sites for housing (as opposed to potential sites for rezoning) includes the Dublin-Pleasanton Bay Area Rapid Transit (BART) station property.

⁶ The 2015-2023 (5th Cycle) Housing Element assumed 249 units at the property. Pursuant to AB 2923, and as evaluated in this Draft Program Environmental Impact Report (Draft Program EIR), the property would have a density of 75 dwelling unit/acre (du/acre), resulting in a total of 555 potential units, or 306 additional units to what was evaluated in the Final Supplemental Environmental Impact Report for the City of Pleasanton Housing Element and Climate Action Plan General Plan Amendment and Rezonings.



Figure 2-1: Dublin-Pleasanton BART Station Property

Table 2-5: Existing Residential Capacity and Projected Shortfall

RHNA versus Existing Residential Capacity	Income Category				Total
	Number of Units—Very Low Income (<50 percent of Area Median Income)	Number of Units—Low Income (50-80 percent of Area Median Income)	Number of Units—Moderate Income (80-120 percent of Area Median Income)	Number of Units—Above Moderate Income (>120 percent of Area Median Income)	
RHNA-Pleasanton	1,750	1,008	894	2,313	5,965
Existing Residential Zoning					
Carryover from City of Pleasanton 2015-2023 (5 th Cycle) Housing Element (additional information provided in Table 2-6)	825	376	442		1,643
Capacity from existing residential zoning	265	176	199		640

RHNA versus Existing Residential Capacity	Income Category				Total
	Number of Units–Very Low Income (<50 percent of Area Median Income)	Number of Units–Low Income (50-80 percent of Area Median Income)	Number of Units–Moderate Income (80-120 percent of Area Median Income)	Number of Units–Above Moderate Income (>120 percent of Area Median Income)	
Pipeline Projects					
Entitled/Approved Projects (additional information provided in Table 2-7)	23	—	393		416
Accessory Dwelling Units (ADU)s	5	28	46	14	93
Total Residential Capacity	1,146	598	1,048		2,792
Projected Shortfall¹	(1,612)	(296)	(1,265)		(3,173)
Notes: HCD = California Department of Housing and Community Development RHNA = Regional Housing Needs Allocation ¹ Although the analysis of existing capacity generally identifies production in more detail across affordability categories, HCD’s guidance treats planning for “lower income” housing in a manner that conceptually aggregates Extremely Low, Very Low, and Low Income categories, and therefore the table similarly aggregates them. Source: City of Pleasanton 2022.					

Table 2-6: 5th Cycle Housing Element Density Carryover Inventory Sites

Site Name	Address	Size (development areas)	Low-Income Units	Moderate-Income Units	Above-Moderate-Income Units	Total Units
High Density Housing Sites						
BART ¹	5835 and 5859 Owens Drive	7.5 acres	555	—	—	555
Hacienda (Roche)	4300 Hacienda	12.4 acres	—	372	—	372
Stoneridge Shopping Center	1008 Stoneridge Mall Road	10 acres	88	—	312	400
Kaiser	5600 Stoneridge Mall Road	6.1 acres	182	—	—	182
Other Carryover Sites						
Auf de Maur (Bernal)	4334 Bernal Avenue	10.17 acres	—	—	30	30

Site Name	Address	Size (development areas)	Low-Income Units	Moderate-Income Units	Above-Moderate-Income Units	Total Units
CM Capital	5758 West Las Positas Boulevard	6.61 acres	—	—	83	83
Lin Property	1399 Benedict Court	560.34 acres	—	—	10	10
Auf der Maur (Rose)	418 Rose Avenue	.26 acres	—	4	—	4
Other Sites	Various	25.67 acres	—	—	7	7
Total			825	376	442	1,643

Notes:
¹ Based on AB 2923, assumptions for the Dublin-Pleasanton BART station property, comprising two parcels, have been adjusted to 555 units, from the 2015-2023 (5th Cycle) Housing Element (249 units), to account for the additional density permitted under approved legislation.

Table 2-7: 5th Cycle Housing Element Pipeline Projects

Site Name	Address	Size	Low-Income Units	Moderate-Income Units	Above-Moderate-Income Units	Total Units
Lund Ranch	1500 Lund Ranch Road	195 acres			43	43
Spotorno ¹	1000 Minnie Street	113 acres			44	44
PUD-117	2188 Foothill Road	12 acres			7	7
PUD-135	990 Sycamore Road	3 acres			3	3
The Residence at California Center	4550 Rosewood Drive	8.9 acres	23		282	305
Austin/Meadowlark	3459 Old Foothill Road	8 acres			8	8
PUD-60	2500 Vineyard Avenue	2.5 acres			3	3
PUD-137	375 Sycamore Avenue	1.43 acres			3	3
Total			23	0	393	416

Notes:
¹ Includes 22 primary units and 22 ADUs entitled as part of the approved project.

As shown in Table 2-4, Pleasanton’s share of regional housing for the 2023-2031 period is 5,965 dwelling units and the current inventory of land for production of housing, including sites with existing residential zoning, pipeline projects, and ADUs, can accommodate an estimated 2,792 units. Therefore, after accounting for units that are under construction and existing residential development approvals, the resulting unaccommodated units is estimated at 3,173 dwelling units.

This shortfall is proposed to be met through the Housing Element Update as identified in the General Plan and Specific Plan Amendments and rezoning of nonresidential land on opportunity sites described in the next section.

2.3.5 - Housing Element Update Process

Pleasanton prepared an inventory of sites that could accommodate the RHNA. Based on a preliminary evaluation of the capacity of existing sites zoned for residential development, Pleasanton identified a need for additional locations for future rezoning to allow for residential use, including sites suitable for both lower-income and market-rate housing to address the shortfall between the RHNA and the existing capacity for housing within Pleasanton.

In September 2021, staff began to compile a list of prospective sites from various sources, including developer- and property owner- nominated sites, sites that have known interest in housing development, and sites that may have redevelopment capacity based on their characteristics (such as location, size, and existing utilization or underutilization) and other analyses. After initial review and consideration, staff identified 29 properties or areas to be considered for rezoning to allow residential development. Unlike the 4th Cycle Housing Element update, where only high-density sites were rezoned,⁷ staff identified sites for consideration at high-, medium-, and low-densities to meet not only outstanding lower-income housing needs but also the remaining moderate- or above-moderate-income housing needs. These sites were included in the City's Housing Element Update 6th Cycle (2023-2031) Preliminary Sites Inventory.⁸ The sites were scored based on seven different criteria.

- **Section 1: Site Size and Infill Criteria**—These criteria incorporate parameters assigned in state law for the suitability of sites for higher-density housing (minimum of 0.5 acre and maximum of 10 acres) to provide a more precise definition of “infill” development in alignment with state law and to reflect the availability of both wet infrastructure (water and sewer) as well as dry infrastructure (electricity, telecommunications), which is also a requirement of state law.
- **Section 2: Proximity to Modes of Transportation**—These criteria carry forward parameters included in the City of Pleasanton 2015-2023 (5th Cycle) Housing Element, including proximity to BART or transit stops with frequent service, proximity to bicycle facilities, and convenient freeway access.
- **Section 3: Proximity to Services and Amenities**—These criteria reflect both the general planning principle that residential uses should be convenient to schools, parks, and other amenities and respond to criteria in the California Tax Credit Allocation Committee (TCAC) program that prioritize proximity to these sorts of community amenities in its scoring for affordable housing funding.

⁷ Pleasanton faced a similar shortfall of available residential sites in the City of Pleasanton 2007-2014 (4th Cycle) Housing Element, and at that time rezoned sites to accommodate the RHNA. In the City of Pleasanton 2015-2023 (5th Cycle) Housing Element, sufficient zoned capacity was determined to be available, and therefore no additional sites were rezoned as part of the City of Pleasanton 2015-2023 (5th Cycle) Housing Element.

⁸ City of Pleasanton. 2022. Housing Element Update 6th Cycle (2023-2031): Preliminary Sites Inventory, Data Summaries and Ranking for Sites Under Consideration, Version 4. February 9.

- **Section 4: Environmental Impacts/Hazards**—These criteria reflect key categories of natural hazards and of potential exposure to negative environmental elements such as noise, air pollution, or odors as well as proximity to the Livermore Airport Influence Area.
- **Section 5: Impacts on Sensitive Resources**—These criteria reflect the protection of sensitive resources such as trees, biological, or historic resources.
- **Section 6: Height and Mass Compatibility**—These criteria reflect parameters to gauge consistency and compatibility with adjacent neighboring residential uses.
- **Section 7: Interest in Site**—These criteria gauge property-owner interest for high-density housing and whether the site is vacant or underutilized. Although, per HCD guidance, jurisdictions with a RHNA over 5,000 units are not required to provide evidence of property-owner agreement, it is beneficial to do so since sites (and particularly nonvacant sites) assigned to lower-income housing come under greater scrutiny from HCD.

Staff presented an initial list of potential housing sites for consideration to the Planning Commission on November 10 and December 15, to the Housing Commission on November 18, and at a Community Meeting on December 1⁵. Based on initial feedback from those meetings, the Planning Commission provided a recommendation to the City Council on a list of potential sites to be considered for future rezoning to allow residential development. On February 1 and 8, 2022, the City Council narrowed down the initial list of sites to 25 sites for inclusion in the environmental analysis and for consideration as part of the Site Inventory for the Housing Element Update. All meeting materials and draft documents are available for public review on the project website at <https://www.pleasantonhousingelement.com>.⁹

2.4 - Potential Sites for Rezoning

Pursuant to Housing Element law, a housing element must identify potential sites suitable for redesignation and/or rezoning to accommodate housing needs for all segments of the community. The potential sites for rezoning were developed consistent with provisions of Government Code Section 65583.1, which states, in part, that:

The Department of Housing and Community Development, in evaluating a proposed or adopted housing element for substantial compliance with this article, may allow a city or county to identify adequate sites, as required pursuant to § 65583, by a variety of methods, including, but not limited to, redesignation of property to a more intense land use category and increasing the density allowed within one or more categories.¹⁰

⁹ On July 19, 2022, the City Council considered the Draft Housing Element and authorized its submittal to HCD for the Department's mandated review. Prior to that meeting, Pleasanton Unified School District (PUSD) requested that the Donlon Site be removed from consideration from re-zoning, and the City Council agreed to remove the site from the Draft Housing Element. However, since the technical analysis for this Draft Program EIR was substantially complete by that time, the Draft Program EIR reflects Site 3 (PUSD-Donlon), resulting in a marginally more conservative analysis.

¹⁰ California Legislative Information. No date. California Government Code Article 10.6. Housing Elements [65580-65589.11]. Website: https://leginfo.ca.gov/faces/codes_displayText.xhtml?lawCode=GOV&division=1.&title=7.&part=&chapter=3.&article=10.6. Accessed February 10, 2022.

Considering the evaluation provided above, staff has identified the potential sites to be rezoned that can accommodate future housing to meet the RHNA target. These sites are presented in Table 2-1 and Exhibit 2-3.¹¹ The existing General Plan land use and zoning designation for each site are provided in Exhibits 2-4a and 2-4b, respectively. To present a conservative analysis of potential environmental impacts, this Draft Program EIR assumes a maximum number of residential units on each site totaling 7,388 units.¹² It should be noted that it is unlikely that all the sites would develop at maximum density and this approach provides a conservative analysis with respect to environmental impacts. Assuming 11.5 ADUs would be built per year, over the course of the eight-year planning period,¹³ it is anticipated that 93 ADUs would also be constructed on the potential sites for rezoning. Additionally, as described above, the Housing Element Update assumes an increased density at the Dublin-Pleasanton BART station property, and this Draft Program EIR incorporates analysis of an incremental increase in allowable residential units (306 units). Therefore, this Draft Program EIR assumes a maximum of 7,787 dwelling units. Assuming factors of 2.99, 2.48, and 2.2 persons per household for low-,¹⁴ medium-,¹⁵ and high- density housing types,¹⁶ respectively, this Draft Program EIR assumes the Housing Element Update could result in a maximum of 18,029 new residents.^{17,18,19,20} The final list of approved sites to be adopted by the City Council would be accompanied by the General Plan and Specific Plan Amendments and rezoning actions to accommodate residential housing development, which are described in more detail below and analyzed in this Draft Program EIR.

¹¹ The numbering of the sites does not correspond to site rankings. The sites are numbered throughout this Draft Programmatic EIR consistent with the numbering provided by Pleasanton. Therefore, some numbers are missing because those sites were included in the initial evaluation but removed upon further discussion.

¹² Through the Housing Element Update process, the number of units in the Housing Element Update were updated slightly from the number of units analyzed in this Draft Program EIR. However, since the technical analysis for this Draft Program EIR was substantially complete by that time, the Draft Program EIR reflects the number of units as disclosed in the Notice of Preparation. The slight difference does not impact the analysis, or the conclusions provided throughout this document.

¹³ The ADU estimate is based on the average past 5 years of actual production within Pleasanton, which is consistent with HCD guidance. Given that this Draft Program EIR considers the maximum number of units on the potential sites for rezoning, should any of the Housing Element Update policies facilitate the production of ADUs, any additional units over the 93 units would be accounted for within this evaluation because it is unlikely that all of the sites will develop at maximum density.

¹⁴ Low density includes a density range of 2-7 dwelling units/acres. Typical housing types include detached single-family units and duplexes.

¹⁵ The medium density classes includes both low- medium density and medium density. Low- medium includes a density range of 8-14 dwelling unit/acre. Typical housing types include small lot single- family homes, townhomes, and small-scale apartment buildings. Medium density includes a density range of 15-25 dwelling unit/acre. Typical housing types include attached apartments, condominiums, and townhomes with surface parking.

¹⁶ High density includes a density range of 30 plus dwelling units/acres. Typical housing types include attached apartments and condominiums with structured parking.

¹⁷ United States Census Bureau. 2019. S2504: Physical Housing Characteristics for Occupied Housing Units. Website: <https://data.census.gov/cedsci/table?q=S2504%3A%20PHYSICAL%20HOUSING%20CHARACTERISTICS%20FOR%20OCCUPIED%20HOUSING%20UNITS&g=1600000US0657792&y=2019&tid=ACSST5Y2019.S2504>. Accessed March 8, 2022.

¹⁸ United States Census Bureau. 2019. B25124: Tenure By Household Size By Units In Structure. Website: <https://data.census.gov/cedsci/table?q=B25124%3A%20TENURE%20BY%20HOUSEHOLD%20SIZE%20BY%20UNITS%20IN%20STRUCTURE&g=1600000US0657792&tid=ACSST5Y2019.B25124>. Accessed March 8, 2022.

¹⁹ United States Census Bureau. 2019. B25033: Total Population in Occupied Housing Units By Tenure By Units In Structure. Website: <https://data.census.gov/cedsci/table?q=population%20BY%20UNITS%20IN%20STRUCTURE&g=1600000US0657792&tid=ACSST5Y2019.B25033>. Accessed March 8, 2022.

²⁰ For Sites 15 and 21b, the low density, 2.99, persons per household factor was utilized because that results in a higher population estimate, which presents a conservative population estimate. For ADUs, the high density, 2.2, persons per household factor was utilized because ADUs are accessory units that, by their nature, house fewer people. Therefore, given the density classes being evaluated in this Draft Programmatic EIR, the high density persons per household factor is the most reasonable to utilize for ADUs.

2.4.1 - Densities and Affordability Assumptions

State Housing Law provides for a series of “default densities” which are zoning minimums that, if applied, can be assumed to yield lower-income housing units.²¹ For Pleasanton, the minimum default density for units to be counted as lower-income units in the inventory is 30 dwelling units/acre (du/ac) and between 20 and 29 du/ac to be counted as moderate-income units. Although Pleasanton may count all units in the inventory zoned at 30 du/ac or more as affordable or lower income (or 20-29 du/ac as moderate income), it is not required to do so and could assume that higher density projects would yield moderate or above-moderate units as well.

Table 2-8 summarizes the above density and affordability assumptions, for reference.

Table 2-8: Affordability and Default Densities

Density Category	Density Range	Income Level Potentially Accommodated in Inventory		
		Above-Moderate Income	Moderate Income	Low Income
Low Density	2-7 dwelling unit/acre	X		
Low/Medium Density	8-14 dwelling unit/acre	X		
Medium Density	15-25 dwelling unit/acre	X		
High Density	30 plus dwelling unit/acre	X	X	X

Source: City of Pleasanton. 2022. City Council Agenda: Item 10: Continued Housing Element Update: Sites Inventory Consideration. January 25.

2.4.2 - Density Ranges and Housing Types

Development on most of the potential sites for rezoning would require a General Plan Amendment and to adopt a zoning designation that would allow the residential development in the range of densities as provided in Table 2-1. The proposed General Plan land use and zoning designation for each site are provided in Table 2-9 and Exhibits 2-5a and 2-5b, respectively. Table 2-9 also provides the physical changes anticipated on-site to accommodate housing.

²¹ “No net loss” provisions are a component of the Housing Accountability Act, which, whenever a project is approved with few units, or less affordability than cited in the Housing Element, requires findings to be made that adequate zoning capacity remains in the inventory to accommodate the units not built or for the City to rezone additional sites to accommodate that number of units.

Table 2-9: Proposed General Plan Land Use and Zoning Designations

Site No.	Name	Density Range (du/ac)		Existing General Plan Land Use Designation	Proposed General Plan Land Use Designation	Existing Zoning Designation	Proposed Zoning Designation	Anticipated Changes On-site
1	Lester	2	2	LDR, A, PHS	LDR, A, PHS	Prezoned—A, LDR Unincorporated Alameda County	PUD-LDR-A-OS District	Construction of new single-family residential units, including demolition and replacement of two existing homes; construction of a new EBRPD staging area, grading, and site improvements.
2**	Stoneridge Shopping Center (Mall)	50	80	C, MU	MU	C-R(m) District and PUD-MU District	PUD-MU District	Construction of new residential dwelling units and structured parking on existing surface parking areas. Extent of any potential demolition currently unknown.
3	PUSD—Donlon ²²	5	5	PI	MDR	R-1-65 District	PUD-MDR District	Construction of new single-family homes on vacant lot.
4**	Owens (Motel 6 and Tommy T)	30	40	C	MU	C-F District	PUD-MU District	Construction of new residential units. Existing restaurant expected to be demolished; unknown if existing hotel building would remain.
5**	Laborer Council	30	40	MU, BP	MU, BP	PUD-I/C-O District	PUD-MU District	Demolition of existing office building and replacement with new residential units.

²² On July 19, 2022, the City Council considered the Draft Housing Element and authorized its submittal to HCD for the Department’s mandated review. Prior to that meeting, Pleasanton Unified School District requested that the Donlon Site be removed from consideration from re-zoning, and the City Council agreed to remove the site from the Draft Housing Element. However, since the technical analysis for this Draft Program EIR was substantially complete by that time, this Draft Program EIR therefore continues to reflect the Donlon site, resulting in a marginally more conservative analysis.

Site No.	Name	Density Range (du/ac)		Existing General Plan Land Use Designation	Proposed General Plan Land Use Designation	Existing Zoning Designation	Proposed Zoning Designation	Anticipated Changes On-site
6**	Signature Center	30	40	BP	MU	PUD-I/C-O District	PUD-MU District	Construction of new residential units (housing to replace two existing parking structures); existing office buildings to remain.
7**	Hacienda Terrace	30	40	MU, BP	MU, BP	PUD-I/C-O District	PUD-MU District	Construction of new residential units on a 2-acre portion of existing parking area, at north part of site.
8	Muslim Community Center	15	25	MU, BP, Wildland Overlay	MU, BP, Wildland Overlay	PUD-I/C-O District	PUD-MU District	Construction of new residential units; existing office building likely to be demolished.
9**	Metro 580	45	75	MU, BP	MU, BP	PUD-I/C-O District	PUD-MU District	Construction of new residential units on 5-acre portion of existing site that includes parking and three existing commercial buildings, potentially to be demolished.
11**	Old Santa Rita Area	30	60	C, Wildland Overlay	MU, Wildland Overlay	C-S, PUD-C-O, PUD-O, PUD-C-S, PUD-C, PUD-C-C	PUD-MU District	Construction of new residential units on various parcels; extent of existing development to be demolished unknown and would vary from parcel to parcel.
12**	Pimlico Area (North side)	30	40	C	MU	PUD-C District and C-F District	PUD-MU District	Construction of new residential units; extent of existing development to be demolished unknown and would vary from parcel to parcel.
14	St. Elizabeth Seton	12	18	MDR	HDR	A District	PUD-HDR District	Construction of new residential units on vacant portion of church-owned property.

Site No.	Name	Density Range (du/ac)		Existing General Plan Land Use Designation	Proposed General Plan Land Use Designation	Existing Zoning Designation	Proposed Zoning Designation	Anticipated Changes On-site
15	Rheem Drive Area (southwest side)	8	14	I	MU	PUD-I District	PUD-MU District	Construction of new residential units; extent of existing development to be demolished unknown and would vary from parcel to parcel.
16	Tri-Valley Inn	15	25	C	MU	C-F District	PUD-MU District	Construction of new residential units, likely requiring demolition of existing motel units and restaurant.
18**	Valley Plaza	30	40	C	MU	PUD-C District	PUD-MU District	Construction of new residential units and some replacement commercial space on approximately 5.5 acres, within which most existing buildings expected to be demolished.
19	Black Avenue	15	25	PI	HDR	P District	PUD-MU District	Construction of new residential units; existing office building expected to be demolished.
20**	Boulder Court	30	40	I	MU	I-G-40 District	PUD-MU District	Construction of new residential units; some or all existing structures on-site expected to be demolished.
21a**	Kiewit	30	40	Various*	MDR-HDR	I-G-40 District; S District	PUD-MDR-HDR District	Construction of new residential units on vacant site.
21b**	Kiewit	8	14	Various*	MDR-HDR	I-G-40 District	PUD-MDR-HDR District	Construction of new residential units on vacant site.
22	Merritt	2	2	LDR	LDR	Unincorporated Alameda County	PUD-LDR District	Construction of new residential units on mostly vacant site that contains one single-family home. It is anticipated that the existing single-family home will remain.

Site No.	Name	Density Range (du/ac)		Existing General Plan Land Use Designation	Proposed General Plan Land Use Designation	Existing Zoning Designation	Proposed Zoning Designation	Anticipated Changes On-site
23**	Sunol Boulevard	30	40	I	MU	I-P District	PUD-MU District	Construction of new residential units; extent of existing development to be demolished unknown and would vary from parcel to parcel.
24	Sonoma Drive Area	15	25	I	MU	I-P District	PUD-MU District	Construction of new residential units; extent of existing development to be demolished unknown and would vary from parcel to parcel.
25	PUSD–District	8	16	PI	MU	P District	PUD-HDR District	Construction of new residential units; existing development on-site expected to be demolished.
26	St. Augustine	2	7	PI	MDR	A District	PUD-MDR District	Construction of new residential units on vacant portion of church-owned property.
27	PUSD–Vineyard	3	5	PI	MDR	PUD-School District	PUD-MDR District	Construction of new residential units on vacant site.
29**	Oracle	45	75	MU, BP	MU, BP	PUD-I/C-O District	PUD-MU District	Construction of new residential units on vacant portion of property.

Notes:

High-density sites are denoted with purple shading background and the medium-and low-density sites are denoted with the green shading background.

* The General Plan land use map depicts multiple potential land uses within the entire East Pleasanton area, which includes the Kiewit site. Program 6.1 of the General Plan indicates that allowable uses in this area are to be considered through a Specific Plan process.

** The proposed General Plan land use designations and zoning reflect the existing General Plan land use designations and zoning that would allow the uses as envisioned by the City. However, the City may adopt alternate General Plan land use and zoning designations to align with State requirements that these sites allow 100 percent residential by right if 20 percent of units are designated for lower income. These designations would allow the density ranges prescribed by the Housing Element Update and analyzed in this Draft Program EIR.

Source: City of Pleasanton 2022.

General Plan Land Use Designations			
LDR	Residential–Low Density	ICO	Industrial/Commercial/Office
MDR	Residential–Medium Density	I	General and Limited Industrial
HDR	Residential–High Density	MU	Mixed Use
C	Retail/Highway/Service Commercial/Business and Professional Offices	CF	Community Facilities
BP	Business Park	PI	Public and Institutional
		A	Agriculture and Grazing
		OS	Open Space
		PHS	Public Health and Safety
		PR	Parks and Recreation
Zoning District			
A	Agriculture District	MU	Mixed Use District
R-1-65	One-Family Residential District, 6,500 square feet minimum lot size	I	Industrial District
RM	Multi-Family Residential Districts	I/C-O	Industrial/Commercial Office District
C	Commercial District	I-P	Industrial Park District
C-C	Central Commercial District	I-G-40	General Industrial District, 40,000 square feet minimum lot size
C-S	Services Commercial District	Q	Rock, Sand and Gravel Extraction District
C-F	Freeway Interchange Commercial District	P	Public and Institutional District
CR-(m)	Regional Commercial District (mall)	PUD	Planned Unit Development District
O	Office District	LDR	Low Density Residential District
		MDR	Medium Density Residential District
		HDR	High Density Residential District
		OS	Open Space District
		S	Study District

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This Draft Program EIR conservatively analyzes impacts of the development of all the potential sites for rezoning listed above. However, Pleasanton has the ultimate discretion to identify the appropriate opportunity sites to meet project objectives, including adequate sites that would be available to accommodate the RHNA.

The proposed rezonings would not alter the Wildland Overlay or the Public Health and Safety Land Use Designations of the potential sites for rezoning that fall within those areas, and no development would occur within the Wildland Overlay areas.

2.4.3 - Density Bonus

California Government Code Section 65915 (California SB 1818, Chapter 928) includes requirements for local governments to provide developers with a density increase over otherwise maximum allowable residential density (density bonus) and other incentives, provided the developer meets certain requirements to construct housing with units affordable to lower- or moderate-income households, as explained in Section 65915 (b) of the Government Code:

- 65915 (b) A city, county, or city and county shall grant a density bonus and incentives or concessions described in subdivision (d) when the applicant for the housing development seeks and agrees to construct at least any one of the following:
- (1) Ten percent of the total units of a housing development for lower-income households, as defined in Section 50079.5 of the Health and Safety Code.
 - (2) Five percent of the total units of a housing development for very low-income households, as defined in Section 50105 of the Health and Safety Code.
 - (3) A senior citizen housing development as defined in Sections 51.3 and 51.12 of the Civil Code.
 - (4) Ten percent of the total dwelling units in a condominium project as defined in subdivision (f) of, or in a planned development as defined in subdivision (k) of, Section 1351 of the Civil Code, for persons and families of moderate income, as defined in Section 50093 of the Health and Safety Code.

Therefore, individual development applications could include a density bonus if they provide the required number of affordable housing units and be entitled to request waivers and/or concessions, typically relief from the typically applied development standards. Because no individual development applications are being considered as part of the Housing Element Update, it is infeasible and too speculative for the City to anticipate qualified applications, estimate the number of units that would be built pursuant to a density bonus, conjecture as to development incentives or concessions, or to identify where those units would be located with a degree of certainty necessary to conduct meaningful analysis. However, this Draft Program EIR conservatively analyzes impacts of the maximum development of all the potential sites for rezoning listed above. Given that not all sites are expected to develop at their maximum allowable density, due to site-specific constraints, and market-driven and other factors, additional units built pursuant to a density bonus would be accounted for within this EIR's programmatic evaluation.

2.5 - Project Characteristics

2.5.1 - Housing Element Policies and Programs

In addition to the RHNA, the Housing Element Update includes several programs intended to improve the quality of the housing inventory, conserve existing neighborhoods, increase housing affordability, and remove potential governmental and non-governmental constraints to housing for lower-income households and persons with special needs. Based on guidance from the State, constraints to housing production can include concerns such as availability of infrastructure, lengthy processing or permitting timeframes, and costs of construction and other similar factors. Programs in the Housing Element Update would specify actions the City could undertake to overcome such constraints, such as providing streamlined project review for residential developments, completing needed plans for infrastructure and ensuring capital improvement and developer funding supports necessary improvements, and providing city grants or other funding to help subsidize production of lower-income housing units. The new and revised goals, policies, and programs included as part of this Housing Element Update with the potential to result in environmental effects are provided below (the complete Housing Element goals, policies, and programs is found in Appendix B).

Goal 1 Provide sufficient sites for housing development to accommodate Pleasanton’s share of the regional housing need.

Policies

- Policy 1.1** The City will identify, and rezone sites as needed to allow for residential development, at appropriate densities, to meet the assigned Regional Housing Needs Allocation (RHNA) of 5,965 units for the 2023-2031 (6th Cycle) Housing Element Cycle.
- Policy 1.2** Maintain the amount of high-density residential acreage currently designated on the General Plan Land Use Map that permits high-density housing and maintain land use designations for sites rezoned to accommodate the 6th Cycle RHNA.
- Policy 1.3** Encourage residential and mixed-use projects to be designed at the maximum building height permitted consistent with standards to be adopted in the Objective Design Standards as referenced in Program 6.1 (in the Housing Element Update). However, in the downtown, multi-family residential building height should be consistent with the requirements of the Downtown Specific Plan and the Downtown Design Guidelines.
- Policy 1.4** Support the development of sites designated for residential uses, particularly sites zoned for higher density and lower- and moderate-income housing. Actively pursue partnerships and other opportunities for the development of projects with a high proportion of affordable housing units on these sites.
- Policy 1.6** Promote the construction of Accessory Dwelling Units and/or Junior Accessory Dwelling Units, both in conjunction with existing residential development, and as part of new construction. As part of this policy, require new single-family residential

subdivisions of 10 or more units to incorporate ADUs or JADUs in the plans and designs for new residences in at least 50 percent of the proposed lots; however, this would not be required of any new units affordable to households earning 120 to 150 percent of the Area Median Income (AMI) based on initial sales or rental cost.

Policy 1.7 Increase housing in the commercial portion of the downtown area by permitting up to three-story construction in the downtown area pursuant to the Downtown Specific Plan, with one or two stories of residential over commercial in mixed-use buildings, or residential behind commercial on the same lot, subject to conformance with applicable policies of the Downtown Specific Plan.

Programs

Program 1.1 Maintain zoning/rezone appropriate sites to accommodate Pleasanton's share of the regional housing need for all income levels. Parcels to be rezoned are identified in Appendix B, Table B- 13 [in the Housing Element Update]. As reflected in Appendix B [in the Housing Element Update], each potential rezoned lower-income site will be zoned for a minimum of at least 30 units per acre, have the capacity to accommodate at least 16 units, and be available for development in the planning period where water, sewer, and dry utilities can be provided. Sites rezoned for lower-income unit capacity will permit owner-occupied and rental multi-family uses by right pursuant to Government Code §65583.2(h) and (i) for developments in which 20 percent or more of the units are affordable to lower-income households. On rezoned lower-income sites, the City will allow 100 percent residential use and shall require residential use to occupy at least 50 percent of the floor area in a mixed-use project.

Program 1.3 Adopt zoning standards consistent with the Bay Area Rapid Transit (BART) Transit Oriented Development (TOD) Place Type: Neighborhood/Town Center for AB 2923-eligible parcels within a half-mile of the West Dublin/Pleasanton and Dublin/Pleasanton BART stations. This includes requiring a minimum of 75 dwelling units per acre and five stories. To encourage the development of housing at the Dublin/Pleasanton BART parking lot parcels, the City will take the following steps:

- Develop and adopt Objective Design Standards for the Dublin/Pleasanton BART parking lot parcels that reflect the allowable minimum development standards set forth in AB 2923.
- Undertake preparation of a concept plan for the Dublin/Pleasanton BART parking lot parcels, with input from BART and the community, that addresses the range of allowable land uses, including housing at the assigned density. The City will lead the planning effort and seek grant and other funding to support this effort.
- Ensure that the plan adequately addresses parking for new uses and existing commuter parking needs, with the goal to provide an appropriate amount of replacement parking and implement strategies to reduce and manage overall parking demand. Funding for replacement parking, including potential non-BART sources of funding, will be addressed in coordination with the City and BART.

Project Description

- During and upon adoption of the plan, the City will work with BART to actively pursue development interest in the parcels, including soliciting developer input on the plan during plan preparation, and issuance of Request(s) for Proposals to pursue development of the site during the 6th Cycle Housing Element planning period.

Program 1.4 Pursuant to AB 1397, certain rezoning requirements apply if a lower-income housing site identified in Appendix B [in the Housing Element Update] was identified as a housing site (for any income level) in a previous Housing Element’s site inventory. The following vacant and nonvacant lower-income sites are subject to this rezoning requirement:

- Vacant lower-income sites that have been included in at least two consecutive Housing Element site inventories.
- Nonvacant lower-income sites that have been included in a prior Housing Element sites inventory.

The City will allow development by right pursuant to Government Code §65583.2(i), and subject to conformance with applicable objective design and development standards, when 20 percent or more of the units are affordable to lower-income households on sites identified in Table 4-1 [in the Housing Element Update] to accommodate lower-income RHNA that were previously identified in past Housing Element(s).

Table 4-1: Re-Used Sites to be Rezoned

APN	Site Name	Address	Parel Size (ac)	Zone	Lower-Income Units Capacity (realistic)
941 120105203	Kaiser	5600 Stoneridge Mall Road	6.1	PUD-MU	182
941 277101500	BART	5859 Owens Drive	6.9	PUD-MU	259
941 277800200	BART	5835 Owens Drive	8.0	PUD-MU	296
941 120109403	Stoneridge Shopping Center	1008 Stoneridge Mall Road	10.0 (zoned for residential)	C-r (m)/PUD-MU	88

Program 1.6 For those properties designated for high-density residential development with existing commercial uses, conduct outreach with property owners and businesses to identify specific incentives for business relocation and to encourage property owners to develop their properties with housing. Develop appropriate incentives that would facilitate relocating existing commercial/office/industrial uses in order to enable development with residential uses. The City will facilitate the conversion of

commercial, office, industrial buildings and parking structures for housing and mixed-use developments with use of incentives, which may include:

- Transfer of development rights;
- A review of traffic requirements and evaluation measures to facilitate mixed use development;
- Development of transit alternatives;
- Use of development agreements;
- Flexibility of parking standards;
- Flexibility of development standards for converting existing buildings or space to residential (i.e., adaptive re-use) to ensure minimum and maximum densities can be achieved; and
- Expedited processing of development applications.

Program 1.7 Facilitate the development of the large Kiewit and Stoneridge Mall properties with housing by undertaking the following programs:

- *Stoneridge Mall*: Prepare and adopt a Specific Plan, Master Plan or PUD plan for development of the Stoneridge Mall property (Area 2), in cooperation with the various property owners, that incorporates housing at the amount and densities specified in the housing sites inventory, including lower-income housing, as well as complementary commercial uses. The goal of the planning effort is to create a vibrant mixed use and transit-oriented development that provides significant housing opportunities, including affordable housing, in proximity to employment, shopping and services, that is well connected to and incorporates multimodal transportation facilities.
- *Kiewit Property*: Either in conjunction with preparation of a Specific Plan for East Pleasanton, or within a more focused Master Plan or PUD plan for the 50-acre Kiewit area (Area 21), work with the property owner to develop and adopt or approve a conceptual plan, including housing at mixed densities, and a significant affordable housing component. The planning will take into account infrastructure, circulation, open space and amenities for residents, with the goal of creating a sustainable new neighborhood in Pleasanton. New public infrastructure (e.g., water, sewer, roadways, etc.) will be necessary throughout the East Pleasanton Specific Plan (EPSP) area, and cost sharing of public infrastructure improvements is expected to occur among EPSP developers, anticipating the use of community facilities districts or similar financing structures. The plan will encourage a diversity of housing types and seek to include innovative missing-middle type housing that can provide more compact units and market-rate homeownership and/or rental housing that is relatively affordable compared to larger units. Such affordable by design approaches are intended to achieve more housing that is affordable to first-time home buyers and other households that are unable to afford most newly-constructed market-rate housing in Pleasanton but do not qualify for below-market rate housing.

Program 1.8 Monitor the production of accessory dwelling units (ADUs) and junior accessory dwelling units (JADUs) to determine if they are being rented and, if so, determine their rent levels. Per the City’s updated ADU ordinance (2021), all ADUs must be registered in the City’s monitoring program to determine rent levels of the ADUs being created. If it is determined that rent levels are exceeding those projected in the inventory or that ADU production is not keeping pace with Housing Element projections, the City will study and implement additional measures to encourage more production of, and affordability among, ADUs, such as fee waivers or reductions in exchange for deed-restricting a unit.

Program 1.9 The following programs will be implemented to facilitate the product of ADUs:

- Prepare and distribute standardized and/or pre-approved building plans for ADUs that meet the requirements of Chapter 18.106 of the Pleasanton Municipal Code (Accessory and Junior Accessory Dwelling Units) and the California Building Standards Code. The City will publicize such building plans to interested persons inquiring or applying for an ADU, and incentives provided, such as reduction of permit fees, for applicants wishing to make use of such pre-approved plans.
- Create and maintain informational materials and an ADU resource web page on the City’s website to publicize and promote the availability of standard building plans; post information about available funding for ADUs (e.g., CalHFA ADU Grant Program that provides up to \$25,000 to reimburse homeowners for predevelopment costs). Materials will be made available through multiple outreach methods in addition to the City website, press releases, utility mailers, email distribution lists, social media, community service groups, etc.) and in multiple languages.

Program 1.10 Complete annexation of the housing sites located in unincorporated Alameda County (i.e., Lester and Merritt rezone parcels). If the annexations cannot be completed within three years, the City will identify and rezone additional sites to address the City’s RHNA shortfall. These parcels will also be rezoned consistent with Program 1.1.

Goal 2 Use a range of tools and methods to facilitate housing production, reflecting a range of housing types, sizes, affordability levels, and tenure, and provide access to housing opportunities that meet the diverse needs of the community.

Policies

Policy 2.3 In conformance with the Inclusionary Zoning Ordinance, require each residential and non-residential development to which the Ordinance applies, to include its pro-rata share of housing needs for lower- and moderate-income households or, if the Ordinance criteria are met, to contribute to the Lower Income Housing Fund or propose alternative methods to facilitate the construction of housing affordable to these groups. It is strongly encouraged that the Inclusionary Zoning Ordinance

requirements be met by building housing affordable to lower- and moderate-income households. The City will continue to offer incentives to encourage and facilitate the production of affordable inclusionary units, as a component of the Ordinance.

Policy 2.5 Seek opportunities and apply when eligible, for Federal, State and regional grants offered for mixed-use development near transit centers, including grant funding to upgrade infrastructure and transportation needed to support new high-density and transit-oriented development, as well as for the construction of affordable housing projects.

Policy 2.7 Encourage the use of density bonuses in residential projects that include housing units affordable to extremely low-, very low-, low-, and moderate-income households.

Programs

Program 2.2 Require new commercial development to pay the Lower-Income Housing Fee established by City Ordinance and adopted by the City, or to otherwise mitigate demand for new employee housing as allowed by the Pleasanton Municipal Code (e.g., through construction of units or dedication of land). Regularly evaluate the amount of these fees to ensure that they: (1) remain commensurate with the needs generated by the development; (2) are established at a level proportionate with the actual cost to provide new housing; and (3) are in conformance with state law while ensuring that Pleasanton remains locally and regionally competitive in attracting new commercial investment.

Program 2.3 Regularly review the Lower-Income Housing Fee for market-rate residential development, including consideration of adjustments to the fee within the amounts supportable by the existing Nexus Study to ensure the fee reflects the cost to mitigate demand for new affordable housing created by new development, and while ensuring that fee levels remain such that they do not present an undue constraint to housing production. As part of the review of existing fees, consider changing the basis of the residential fee to be structured on a per square foot basis, so as to incentivize the production of smaller units.

Program 2.4 Continue to make available funding from sources such as the City's Lower Income Housing Fund, and the City's Federal HOME and CDBG funds to assist local non-profit agencies and housing developers. The City will also provide technical support to agencies to seek other sources of funding and to plan and develop affordable and special needs housing.

Program 2.7 Amend the affordable housing density bonus provisions of the Pleasanton Municipal Code (Chapter 17.38, Density Bonus), as well as General Plan Land Use Element Policy 11 to align with state density bonus law (Government Code §65915 et seq.) as it has been amended in recent years.

Goal 4 Reduce governmental constraints to the development and improvement of housing where feasible.

Policies

Policy 4.1 Update and amend existing City design and development guidelines and standards for residential and mixed-use development, to incorporate objective standards whenever possible, so as to reduce uncertainty in the development process while ensuring high quality, livable projects.

Policy 4.2 Ensure that adequate infrastructure is available to support future planned residential growth.

Policy 4.3 Update City codes, policies and regulations, or the implementation thereof, as needed to comply with state law and remove governmental constraints to housing production.

Programs

Program 4.1 As required by state law, the City will review the status of Housing Element programs by April of each year and deliver the review on the form required by the State Department of Housing and Community Development. Various Housing Element programs will result in amendments to the Zoning Ordinance and other regulatory changes to facilitate the production of housing (e.g., Programs 5.6 of the Housing Element Update).

Program 4.2 Develop Objective Design Standards for multi-family and mixed-use development to eliminate subjectivity, consistent with state law including SB 35 and SB 330. This effort will evaluate and address subjective standards and findings required for approval in the Zoning Ordinance and the City's Design Guidelines, including in multifamily and mixed-use districts both within and outside the Downtown. The purpose of these standards is to expedite the approval process for such projects and support the City in meeting its housing goals, while ensuring projects are attractive, well-designed, and provide adequate amenities and livability for residents. As part of this process, engage with experts in the field, and with property owners and developers to ensure that standards will result in financially and physically feasible projects that can achieve the densities assigned to various properties.

Program 4.3 Suspend enforcement of the Growth Management Program and Ordinance (Pleasanton Municipal Code 17.36) as necessary to comply with state law, specifically the Housing Crisis Act (SB 330).

Program 4.4 Develop and update plans and programs to identify and address infrastructure deficiencies, including funding mechanisms for infrastructure improvements necessary to accommodate the planned and projected growth identified in the General Plan and to accommodate the 6th Cycle RHNA. These efforts will include the following:

- Conduct a sewer/wastewater capacity analysis to ensure future sewer infrastructure needs, including sewer infrastructure upgrades and facilities to accommodate the 6th Cycle RHNA, and on the basis of that study, identify and prioritize capital improvement projects and funding needs.
- Adopt written policies and procedures that grant priority for sewer hookups for residential development that helps meet Pleasanton's share of the regional need for lower-income housing, consistent with Government Code §65589.7.
- Continue to assess and plan for adequate water supply and infrastructure, including completion of groundwater treatment improvements to address known contaminants in City-operated wells; completion of water supply and operational plan updates, undertaking required updates to the City's Urban Water Management Plan; working with water suppliers including Zone 7 to ensure adequate supplies; and implementation of the City's recycled water and water conservation programs.
- Identify funding mechanisms for infrastructure improvements contained in the General Plan to accommodate projected housing growth. The City will continue to make infrastructure improvements on an as-needed basis, and based on the priorities established in the above-referenced water and sewer capacity and needs assessments, to accommodate existing and planned growth, typically funded through the Capital Improvement Program (CIP), in turn funded by the General Fund, and developer impact and connection fees.

Goal 5 Address the community's special-housing needs.

Policies

Policy 5.1 Provide housing opportunities in residential, mixed-use and infill areas, especially near high frequency transit and other services, for households with special needs such as studio and one bedroom apartments for the elderly and single-person households, Single Room Occupancy (SROs), three-bedroom apartments for large households, specially designed units for persons with disabilities, and units affordable to extremely low-, very low- and low-income households with single-parent heads of households or those with disabilities (including developmental disabilities).

Programs

Program 5.6 Implement the following amendments to Title 18 of the Pleasanton Municipal Code, Zoning, to remove governmental constraints and facilitate special needs housing:

- Explicitly allow for Single Room Occupancy units (SROs) to facilitate the provision of affordable housing for lower-income individuals, including seniors, persons with disabilities, and extremely low-income persons.
- Allow residential care facilities (sometimes called group homes) with six or fewer residents as a residential use and subject to the same development standards as a single-family dwelling. No conditional use permit, zoning variance, or other zoning

clearance will be required of a residential facility that serves six or fewer persons that is not required of a family dwelling of the same type in the same zone. Also, allow residential care facility with seven or more residents subject to conformance with objective standards (to be developed as part of this program) to ensure these larger facilities do not negatively impact neighborhoods. The residents and operators of a residential care facility will be considered a family for the purposes of any law or zoning ordinance that relates to the residential use of property. However, “six or fewer persons” does not include the operator, operator’s family, or persons employed as staff.

- Allow transitional and supportive housing by right in all zones which allow residential uses, subject to the same standards of similar dwellings, consistent with AB 2162 and other state law provisions.
- Allow low barrier navigation centers by-right in all areas zoned for mixed-uses and nonresidential zones permitting multi-family uses, consistent with AB 101 (Government Code §65660 et seq.).
- Amend the emergency shelter separation requirement in the Zoning Ordinance to be consistent with the state law (i.e., maximum separation requirement cannot exceed 300 feet).

Goal 6 Plan effectively for new development and ensure housing is developed in a manner that reduces its environmental impacts, keeps pace with available infrastructure and services, improves the quality of life for existing and new residents, and is compatible with existing development and adjacent uses.

Policies

Policy 6.1 Disperse high-density housing throughout the community, in areas near public transit, major thoroughfares, shopping, and employment centers, and ensure that livability is considered when considering proposals for high density residential developments, including open space, amenities, and facilities for the intended occupants.

Policy 6.2 Seek to improve the local jobs-housing balance and match and increase the percentage of residents that both live and work in Pleasanton, by accommodating additional housing within the City and facilitating the provision of housing at affordability levels that match local wages, including households with lower-wage jobs.

Policy 6.3 Strongly encourage residential infill in areas where public facilities are or can be made to be adequate to support such development.

Policy 6.4 Ensure that new housing development and improvements to existing housing (e.g., rehabilitation, remodels and additions) integrate sustainable design and energy efficiency features, including a reduced lifecycle carbon footprint of materials required for the development of housing (i.e., remodels, additions, and new units),

reduced energy and water consumption and efficiency, and expanded use of renewable energy sources.

Policy 6.5 Encourage new housing to be located in areas well-served by public transit and the active transportation network (e.g., pedestrian and bicycle facilities), and seek to improve these facilities throughout the city, in order to improve access to all modes of transportation and reduce Vehicle Miles Traveled (VMT) associated with new development.

Programs

Program 6.1 Develop and adopt Objective Design and Development Standards for each of the sites zoned for densities above 30 dwelling units per acre, including appropriate height limits, Floor Area Ratio, setbacks, massing, open space and parking requirements, and approval criteria (i.e., findings for approval) to ensure projects can accomplish their assigned densities, while mitigating potential incompatibilities between those higher density projects and adjacent uses, for example by providing for buffers or stepping heights between existing lower-density and new higher density buildings.

Program 6.2 Implement the Climate Action Plan's (CAP 2.0) applicable actions related to new residential construction, improving residential water and energy efficiency, and reducing VMTs associated with new units including the following: P1–All Electric Reach Code, P2–Existing Building Electrification Plan, P4–Solar and Storage on New Construction, P5–Zero Emissions Infrastructure, P8–Improve Bicycle Amenities, P9–Bicycle Rack Incentive Program, P10–Increase Transit Ridership, P11–Promote LEED Neighborhood Development, P15–Water Efficiency Retrofits, S1–Refrigerant Management, S2–Energy Efficiency Upgrades, and S6–Embodied Carbon Reduction Plan.

Program 6.3 Seek out and utilize available energy efficiency upgrade program funding for low-interest loans to support alternative energy usage and/or significant water conservation systems in exchange for securing new and/or existing rental housing units affordable to very low- and low-income households.

Program 6.4 Work to enhance multimodal transportation throughout Pleasanton by:

- Implementing the network of bicycle and pedestrian facilities envisioned in the Bicycle and Pedestrian Master Plan, to enhance the citywide network of bikeways, walkways, and trails that are accessible, safe, comfortable, and convenient for people of all ages and abilities, and to maximize multimodal transportation options by improving access to BART, ACE, and bus lines. The City will accomplish this by dedicating local and regional transportation funds as available to advance high priority bicycle and pedestrian improvement projects, pursuing grant opportunities to augment local these funds whenever feasible, and by requiring developers to implement multimodal improvements as part of projects.

- Actively participating as a member agency of LAVTA and ValleyLink, and through State and regional advocacy efforts to secure improved transit service to and throughout Pleasanton, including more frequent and convenient bus and rail service.

Program 6.5 Implement the applicable housing-related air quality, climate change, green building, water conservation, energy conservation, and community character programs of the Pleasanton General Plan, including:

- Programs 1.5, 1.7, 1.8, 1.12, 1.13, 1.14, and 3.12 of the Water Element
- Program 9.1 of the Community Character Element
- Policies 2, 3, 4, 6 and 7 and programs 2.1-2.7, 3.1-3.5, 4.1-4.3, 6.1-6.4, 7.1-7.3, and 7.6 of the Energy Element

Program 6.6 Implement the policies and programs of the Downtown Specific Plan (DSP) that aim to improve the amenities, livability, and level of investment in Downtown neighborhoods, including areas that today provide relatively affordable housing opportunities for lower- income residents. DSP policies and programs that support this effort include:

- Policy LD-P.43, to retain and allow for remodeling and enlargement of existing residential units
- Policy LD-P.44 to encourage affordability in future multifamily residential projects through incentives and development concessions such as reduced parking standards
- Policy LD-P.45 to encourage development at densities that exceed the General Plan midpoint to encourage affordable housing
- Policy LD-P.46 to encourage a diversity of housing types including smaller units that are affordable by design
- Policy LD-P.48 to encourage use of the City's housing rehabilitation program
- Policy LD-P.49 to develop a referral program for qualifying homeowners to be connected to non-profit/volunteer organizations that provide home repair services
- Program LD-I.10 to develop and implement a streetscape improvement program
- Program LD-I.18 to provide improved design standards and guidelines for context-sensitive infill development
- Programs PF-1-1 through PF-1.7 to upgrade and improve various components of the sewer, water, and storm drainage system within the downtown to support existing and future development

Although the Housing Element Update is designed to encourage and facilitate new housing construction within the City of Pleasanton, the Housing Element Update does not propose or confer any specific development projects. Accordingly, the adoption of the Housing Element Update is not anticipated to result in direct physical changes to the environment and the Draft Program EIR focuses

on policies that could have environmental impacts related to implementation of the Housing Element Update.

2.5.2 - General Plan Amendments

The Draft Program EIR addresses the environmental impacts related to implementation of the proposed Housing Element Update and associated land use and zoning revisions. In accordance with State law, the City proposes to adopt a General Plan Amendment to update the General Plan's existing Housing Element, including designating sites and identifying updated goals, policies, and actions, along with revisions to the General Plan Land Use Element to ensure consistency between it and the Housing Element, i.e., updating the General Plan land use plan to expand the inventory of land available for the development of new housing within the City and making text amendments to ensure density ranges for Mixed Use designated projects are consistent with those described in the Land Use Element.

The City would also amend the General Plan land use designation of the sites identified in Table 2-1, as shown in Table 2-9, sufficient to meet the remaining unmet housing need. Compliance with Assembly Bill (AB) 2923 to allow for a minimum density of 75 du/acre and increased height for the Dublin-Pleasanton BART station property could require an amendment to the General Plan.

2.5.3 - Specific Plan and PUD Development Plan Amendments

Amendments to the Hacienda Planned Unit Development (PUD) Development Plan and the Vineyard Avenue Corridor Specific Plan may be necessary and are addressed programmatically in this Draft Program EIR. Exhibit 2-3 depicts the sites within Specific Plan areas.

2.5.4 - Zoning Amendments

The City would rezone the sites identified in Table 2-1, as shown in Table 2-9, for consistency with the General Plan Amendments.

2.6 - Project Objectives

State CEQA Guidelines, Section 15124(b), require that the project description in a Draft Program EIR include "a statement of the objectives sought by the proposed project," which should include "the underlying purpose of the project." The underlying purpose of the Housing Element Update is to accommodate the RHNA and increase the inventory of land available for the development of housing compliant with State law and consistent with the General Plan. The following are the primary project objectives for the Housing Element Update:

- Provide a vision for housing through 2031.
- Maintain the existing housing inventory to serve housing needs.
- Meet the City's fair share of the regional housing need to accommodate projected population growth and meet existing housing needs within the City.
- Ensure capacity for development of new housing to meet the RHNA at all income levels.

- Encourage housing development where supported by existing or planned infrastructure while maintaining existing neighborhood character.
- Encourage, develop, and maintain programs and policies to meet existing projected affordable housing needs, including for special needs populations such as persons with disabilities, seniors, the unhoused, and larger households.
- Develop a vision for Pleasanton that supports sustainable local, regional, and state housing and environmental goals.
- Provide new housing communities with substantial amenities to provide a high quality of life for residents.
- Adopt a housing element that complies with California Housing Element Law and can be certified by the State Department of Housing and Community Development (HCD).

2.7 - Intended Uses of this Draft Program EIR

Pursuant to State CEQA Guidelines Section 15367, the City is the lead agency and has discretionary authority over the Housing Element Update and project approvals.

The programmatic level of analysis has been prepared pursuant to State CEQA Guidelines Section 15168. Under Section 15168(c), “[l]ater activities in the program must be examined in the light of the program EIR to determine whether an additional environmental document must be prepared.” Several streamlining options are possible, including, but not limited to: (1) the later activity may be found to be “within the scope of the project covered by the program EIR,” in which case “no new environmental document would be required”; or (2) only minor changes or additions are necessary in which case an addendum is appropriate (State CEQA Guidelines § 15164); or (3) the later activity may be found to be consistent with the zoning established by the General Plan for which an EIR was certified, in which case no additional environmental review is required (State CEQA Guidelines § 15183). or (4) such findings cannot be made and a new project-specific Mitigated Negative Declaration or EIR would be required, depending on the scope of the effects of the later activity.

This Draft Program EIR is specifically intended to be utilized for future actions consistent with the Housing Element Update. For any later activity covered in whole or in part in this program EIR, “[a]n agency shall incorporate feasible mitigation measures and alternatives developed in the program EIR into later activities in the program” (State CEQA Guidelines § 15168(c)(2)).

2.7.1 - Project Approvals

If this Draft Program EIR is certified by the City Council, several actions may be undertaken by the City Council, including adoption of the Housing Element Update and adoption of the amendments and rezonings to implement the Housing Element Update programs to increase the inventory of land available for the development of housing. These actions could occur after any required review by the Planning Commission. Individual housing development projects would be reviewed and approved as required by the procedures of the City’s Municipal Code and as outlined above, may require additional CEQA review, as appropriate.

Although the Housing Element Update does not require other public agency approvals, the City is required to submit a draft of the Housing Element Update to HCD, per Section 65585 of the State Government Code, and consider HCD's findings on the Housing Element Update before it can be adopted by the City Council.

The City intends and anticipates that the certified Final Program EIR would be utilized in conjunction with existing streamlining provisions provided by CEQA, emerging streamlining techniques, such as those related to implementation of the Sustainable Communities Strategy (Public Resources Code [PRC] § 21155), and other streamlining procedures, including those that may become available in the future. To promote the effective use of City resources, the analysis in this certified Draft Program EIR may be considered the first tier of environmental review and it is the intent of the City that future project-specific and/or site-specific CEQA documents may utilize this analysis as appropriate. Tiering refers to a multilevel approach to preparing environmental documents that is codified in Public Resources Code Section 21083.3 and State CEQA Guidelines Section 15152.

As a program-level analysis, this Draft Program EIR considers the reasonably anticipated environmental effects related to the implementation of the Housing Element Update and associated land use and planning revisions. The analysis in this Draft Program EIR does not examine the site-specific effects of individual projects that may occur in the future. Once the Final Program EIR has been certified, subsequent activities within the program must be evaluated to determine whether an additional CEQA document needs to be prepared. Many subsequent activities could be found to be within the scope of the certified Final Program EIR or consistent with the Housing Element Update and General Plan such that additional environmental analysis may not be required (State CEQA Guidelines § 15168(c); 15183).

Additional environmental review under CEQA may be required for subsequent projects based on project-specific characteristics. That later analysis may tier from the certified Final Program EIR as provided by CEQA and would be generally based on the subsequent project's consistency with the Housing Element Update and the analysis in the certified Final Program EIR, as required under CEQA. It may also be determined that some future projects or infrastructure improvements may be exempt from additional environmental review. When individual subsequent projects or activities are proposed consistent with the Housing Element Update, the lead agency that would approve and/or implement the individual project would examine the projects or activities in light of the certified Final Program EIR (see, e.g., State CEQA Guidelines §§ 15152, 15168, and 15183). If the projects or activities would have no significant effects beyond those disclosed in the certified Final Program EIR, no further CEQA compliance would be required.

2.7.2 - Regulatory Requirements, Permits, and Approvals

City of Pleasanton

The City of Pleasanton City Council, as the legislative body, is the approving authority for the Housing Element Update. As part of the approval, the City Council will consider the following discretionary actions:

- Adoption of the City of Pleasanton 2023-2031 (6th Cycle) Housing Element Update.

Project Description

- Certify the City of Pleasanton 2023-2031 (6th Cycle) Housing Element Update Program EIR.
- Amendments to the General Plan Land Use Element, including modifying the General Plan land use map to indicate applicable designations for each housing site, along with rezoning of land consistent with the programs contained in the Housing Element Update to expand the inventory of land available for the development of housing. Amendments to the Hacienda PUD Development Plan and the Vineyard Avenue Corridor Specific Plan as necessary dependent on the specific sites to be rezoned.
- Zoning Code and Zoning Map Amendments. Pursuant to State law, the City has up to three years following adoption of the Housing Element Update to rezone sites. Conservatively, this Program EIR assumes that rezoning would occur at the time of adoption of the Housing Element Update.

Subsequent actions that may be taken by the City with respect to the Housing Element Update include, but are not limited to, the following:

- Annexation of sites currently located in Alameda County and associated modifications to the General Plan land use map and rezoning of these sites, which would occur in conjunction with approval of proposed development projects on such sites.
- Approval of subsequent development applications for residential and mixed-use development, such as Planned Unit Development approval, and project-related approvals such as growth management approval, design review approval, tentative map approval, final map approval, and grading and building permit approval.
- Implementation of the programs set forth in the Housing Element Update.
- Approval of subsequent public facility and roadway improvement projects in support of such residential and mixed-use development.

Other Government Agency Approvals

Additional subsequent approvals and permits that may be required for future residential development projects from local, regional, state, and federal agencies include, but are not limited to, the following:

Federal

- United States Fish and Wildlife Service
- United States Army Corps of Engineers

State

- California Department of Fish and Wildlife
- California Department of Housing and Community Development
- California Department of Transportation

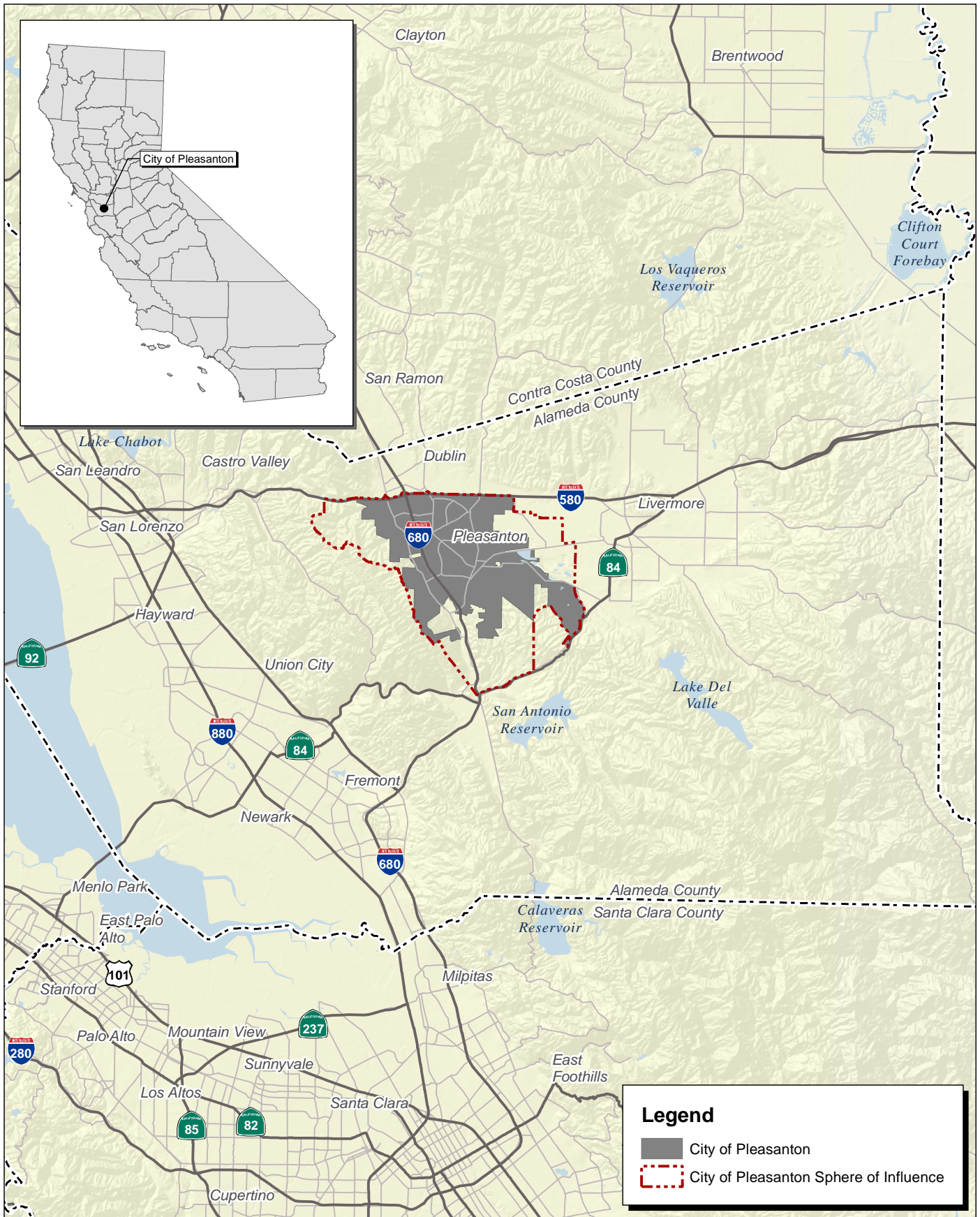
Regional

- Alameda County Airport Land Use Commission
- Alameda County Local Agency Formation Commission
- Alameda County Office of Education
- Bay Area Air Quality Management District
- Bay Area Rapid Transit District
- Dublin-San Ramon Services District
- East Bay Regional Parks District
- Livermore-Pleasanton Fire Department
- San Francisco Regional Water Quality Control Board
- Zone 7 Water Agency

Local

- Pleasanton Unified School District

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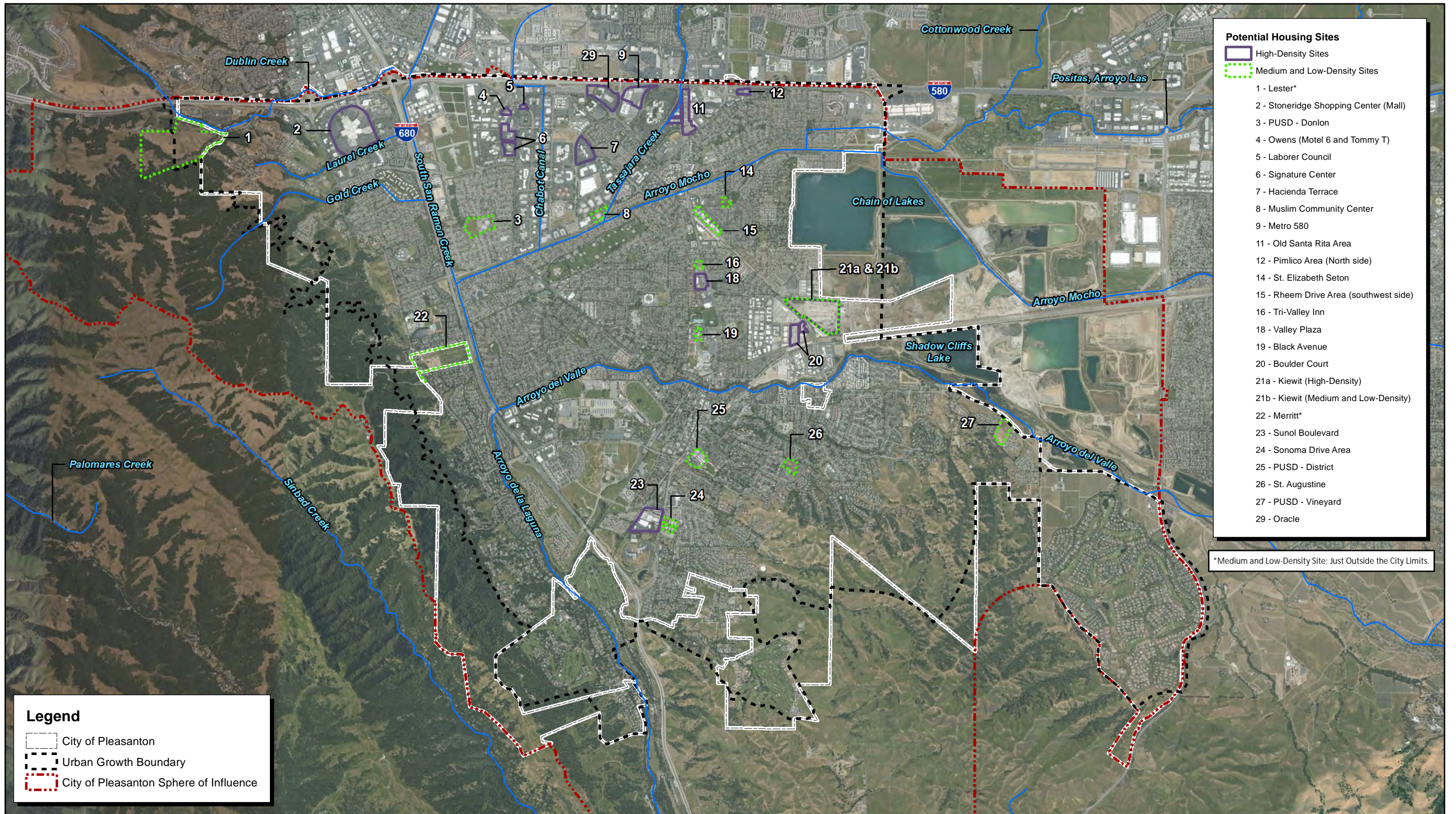
Source: Census 2000 Data, The California Spatial Information Library (CaSIL). City of Pleasanton.

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Exhibit 2-1 Regional Location Map

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- Potential Housing Sites**
- High-Density Sites
 - Medium and Low-Density Sites
- 1 - Lester*
 - 2 - Stoneridge Shopping Center (Mall)
 - 3 - PUSD - Donlon
 - 4 - Owens (Motel 6 and Tommy T)
 - 5 - Laborer Council
 - 6 - Signature Center
 - 7 - Hacienda Terrace
 - 8 - Muslim Community Center
 - 9 - Metro 580
 - 11 - Old Santa Rita Area
 - 12 - Pimlico Area (North side)
 - 14 - St. Elizabeth Seton
 - 15 - Rheem Drive Area (southwest side)
 - 16 - Tri-Valley Inn
 - 18 - Valley Plaza
 - 19 - Black Avenue
 - 20 - Boulder Court
 - 21a - Kiewit (High-Density)
 - 21b - Kiewit (Medium and Low-Density)
 - 22 - Merritt*
 - 23 - Sunol Boulevard
 - 24 - Sonoma Drive Area
 - 25 - PUSD - District
 - 26 - St. Augustine
 - 27 - PUSD - Vineyard
 - 29 - Oracle

*Medium and Low-Density Site; Just Outside the City Limits.

Legend

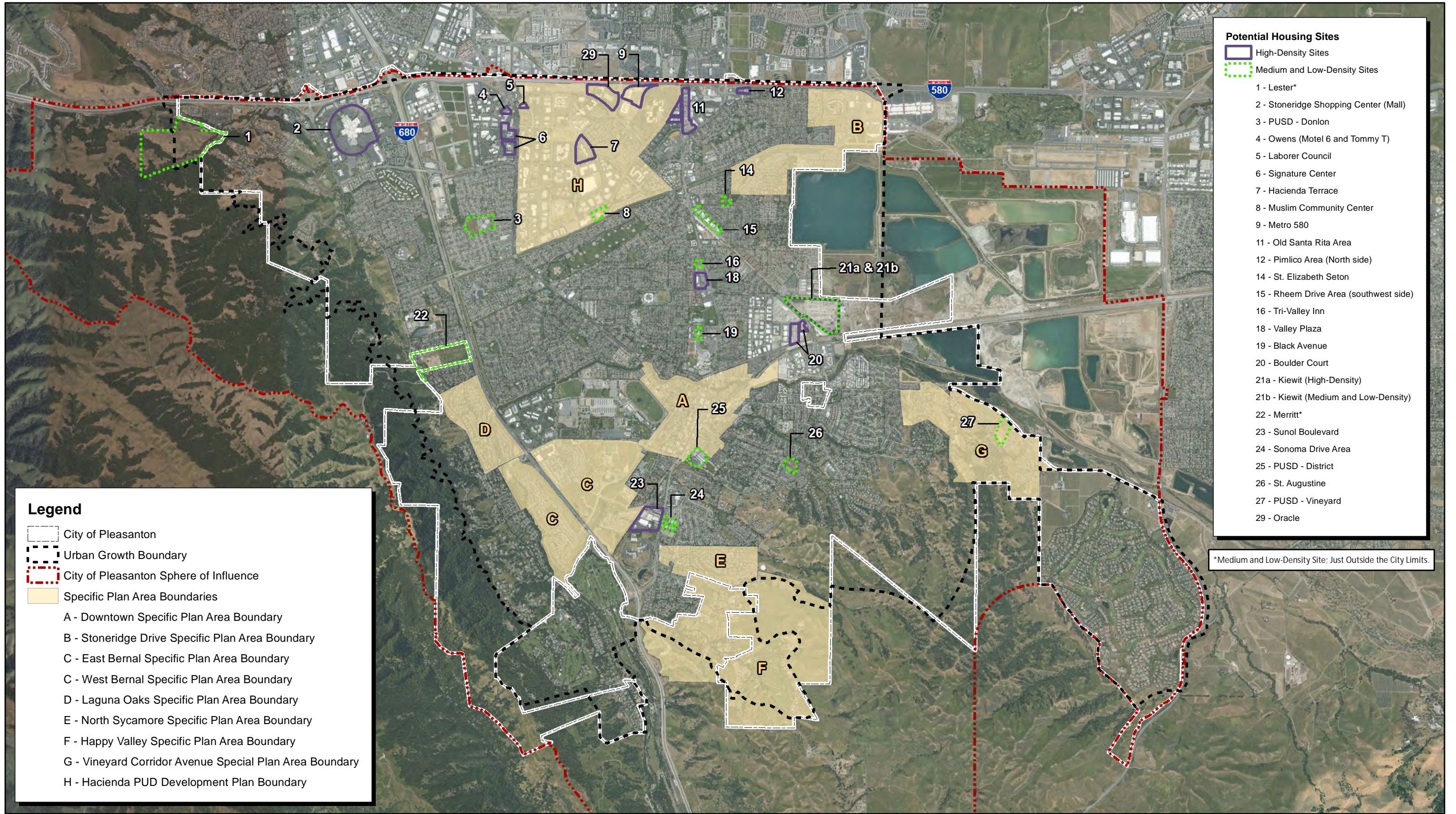
- City of Pleasanton
- Urban Growth Boundary
- City of Pleasanton Sphere of Influence

Source: Bing Aerial Imagery, City of Pleasanton.

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**Exhibit 2-2
Project Location**

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- Potential Housing Sites**
- High-Density Sites
 - Medium and Low-Density Sites
- 1 - Lester*
 - 2 - Stoneridge Shopping Center (Mall)
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 - 4 - Owens (Motel 6 and Tommy T)
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 - 25 - PUSD - District
 - 26 - St. Augustine
 - 27 - PUSD - Vineyard
 - 29 - Oracle

- Legend**
- City of Pleasanton
 - Urban Growth Boundary
 - City of Pleasanton Sphere of Influence
 - Specific Plan Area Boundaries
 - A - Downtown Specific Plan Area Boundary
 - B - Stoneridge Drive Specific Plan Area Boundary
 - C - East Bernal Specific Plan Area Boundary
 - C - West Bernal Specific Plan Area Boundary
 - D - Laguna Oaks Specific Plan Area Boundary
 - E - North Sycamore Specific Plan Area Boundary
 - F - Happy Valley Specific Plan Area Boundary
 - G - Vineyard Corridor Avenue Special Plan Area Boundary
 - H - Hacienda PUD Development Plan Boundary

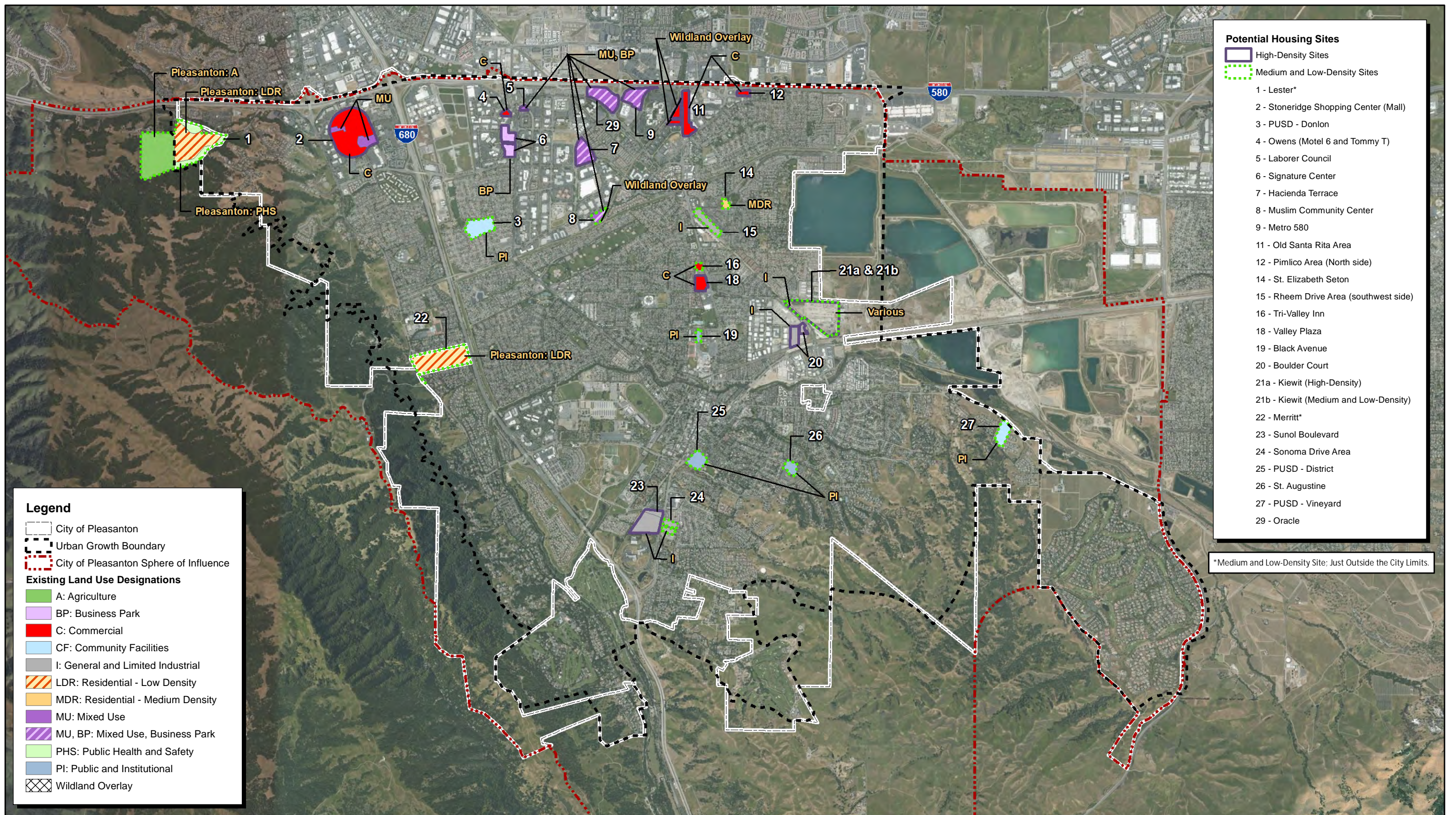
*Medium and Low-Density Site; Just Outside the City Limits.

Source: Bing Aerial Imagery, City of Pleasanton.



Exhibit 2-3
Potential Sites for Rezoning

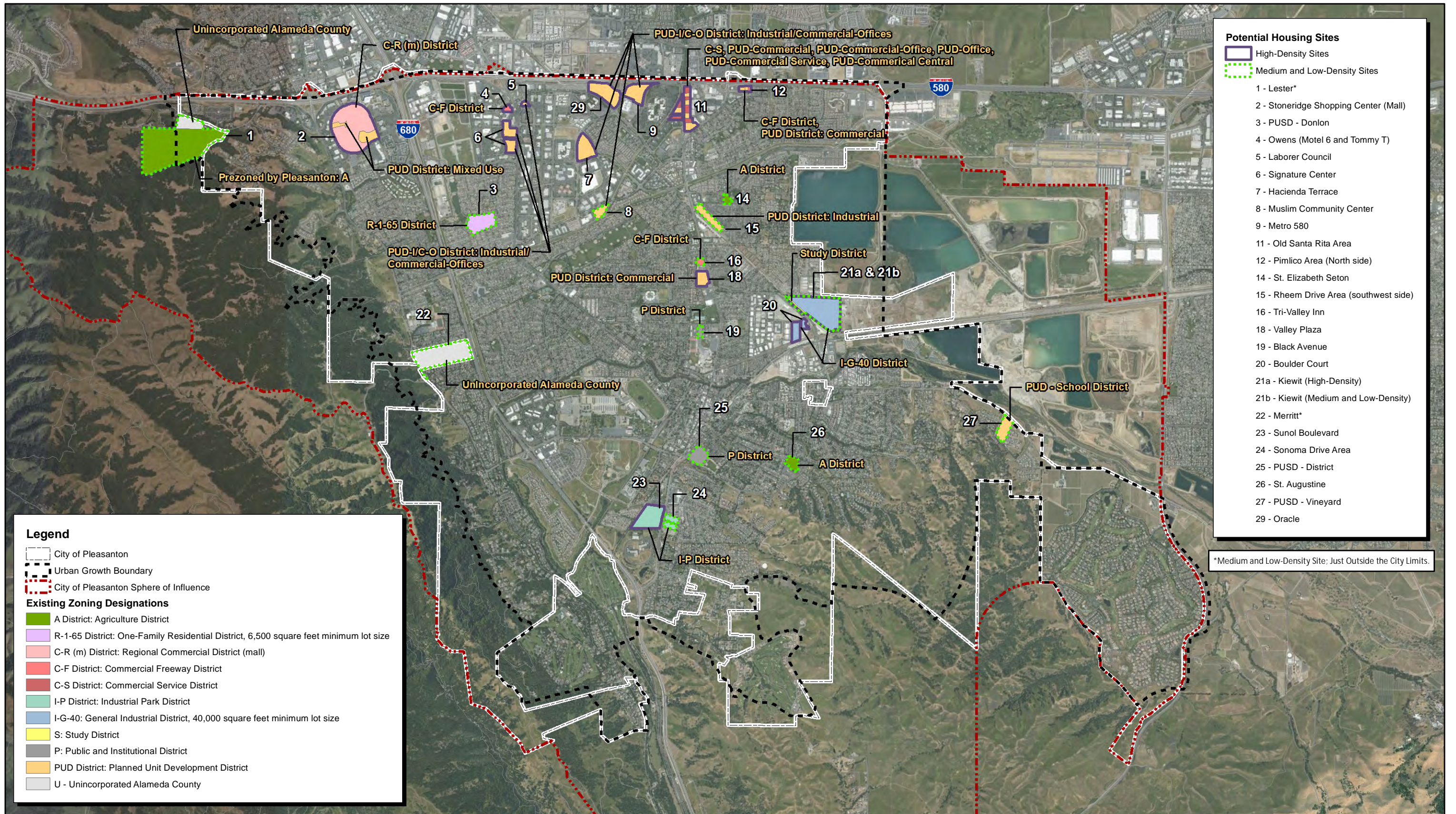
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Source: Bing Aerial Imagery. City of Pleasanton.



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- Potential Housing Sites**
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*Medium and Low-Density Site; Just Outside the City Limits.

Legend

- City of Pleasanton
- Urban Growth Boundary
- City of Pleasanton Sphere of Influence

Existing Zoning Designations

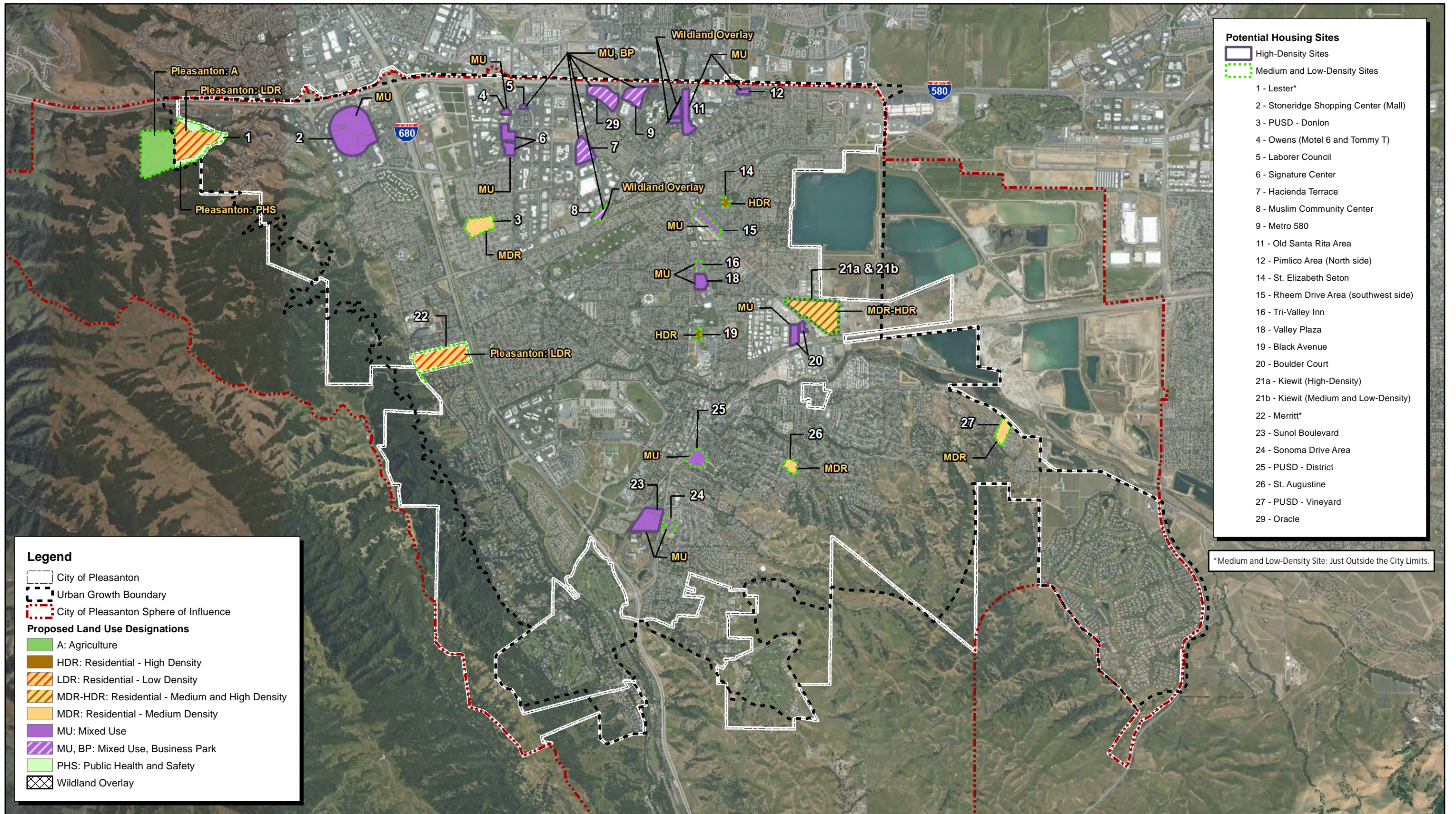
- A District: Agriculture District
- R-1-65 District: One-Family Residential District, 6,500 square feet minimum lot size
- C-R (m) District: Regional Commercial District (mall)
- C-F District: Commercial Freeway District
- C-S District: Commercial Service District
- I-P District: Industrial Park District
- I-G-40: General Industrial District, 40,000 square feet minimum lot size
- S: Study District
- P: Public and Institutional District
- PUD District: Planned Unit Development District
- U - Unincorporated Alameda County

Source: Bing Aerial Imagery. City of Pleasanton.



Exhibit 2-4b
Existing Zoning Designations

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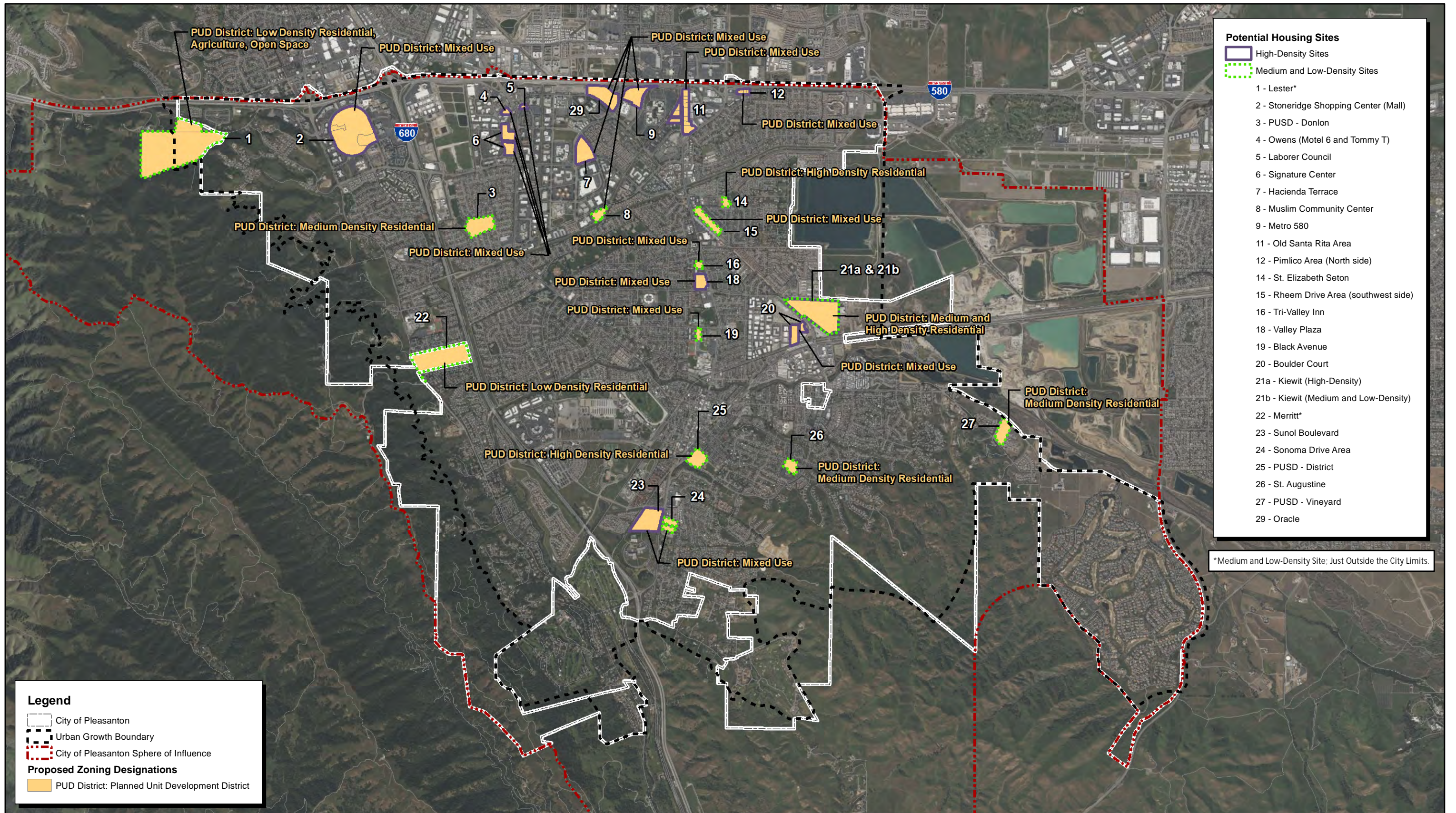
Source: Bing Aerial Imagery, City of Pleasanton.



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Exhibit 2-5a
Proposed General Plan Land Use Designations

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Source: Bing Aerial Imagery, City of Pleasanton.



- Potential Housing Sites**
- High-Density Sites
 - Medium and Low-Density Sites
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*Medium and Low-Density Site: Just Outside the City Limits.

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CHAPTER 3: ENVIRONMENTAL IMPACT ANALYSIS

3.1 - Organization of Issue Areas

This chapter sets forth the physical and regulatory environmental setting and addresses environmental impacts of the Housing Element Update with respect to 17 environmental resource areas. The discussions of the environmental setting describe existing or baseline physical conditions in the vicinity of the potential sites for housing. The baseline used for analyses of environmental impacts under the California Environmental Quality Act (CEQA) reflects the conditions present at the time the Notice of Preparation (NOP) for this Draft Program Environmental Impact Report (Draft Program EIR) was published. Potential impacts associated with the Housing Element Update are compared against the existing baseline conditions for each environmental resource.

3.2 - Issues Addressed in this Draft Program EIR

The following environmental issues are addressed in Chapter 3:

- Aesthetics
- Agriculture and Forestry Resources
- Air Quality
- Biological Resources
- Cultural Resources and Tribal Cultural Resources
- Energy
- Geology and Soils
- Greenhouse Gas Emissions
- Hazards and Hazardous Materials
- Hydrology and Water Quality
- Land Use and Planning
- Noise
- Population and Housing
- Public Services and Recreation
- Transportation
- Utilities and Service Systems
- Wildfire

3.3 - Format of the Environmental Analysis

Each resource area analyzed in this chapter includes the subsections summarized below.

3.3.1 - Introduction

This subsection summarizes what will be discussed in the respective environmental topic section, states what informational documents are used as the basis for the section, and indicates what related comments, if any, were received during the Draft Program EIR public scoping period.

3.3.2 - Environmental Setting

This subsection describes existing, baseline physical conditions of the potential sites for housing and surroundings (e.g., existing land uses, transportation conditions, noise environment) with respect to each resource topic at the time the NOP was issued. Conditions are described in sufficient detail and breadth to allow a general understanding of environmental impacts of the Housing Element Update.

3.3.3 - Regulatory Framework

This subsection describes the relevant federal, State, regional, and local regulatory requirements that are directly applicable to the environmental topic being analyzed.

3.3.4 - Impacts and Mitigation Measures

This subsection evaluates the potential for the Housing Element Update to result in direct and indirect adverse impacts on the existing physical environment, with consideration of both short-term and long-term impacts. The City of Pleasanton is utilizing Appendix G of the State CEQA Guidelines as thresholds of significance except as otherwise indicated in this Draft Program EIR. The significance thresholds for environmental impacts are defined at the beginning of this subsection, and the discussion of the approach to the analysis explains how significance thresholds have been applied to evaluate impacts associated with the Housing Element Update.

Indirect impacts are discussed only for those resources for which they have potential to occur (e.g., cultural resources, air quality, and biological resources). Both project-level and cumulative impacts are analyzed. Project-level impacts could result from actions related to implementation of the Housing Element Update. Cumulative impacts could result from implementation of the Housing Element Update in combination with other cumulative projects. “Cumulative Impacts” provides a discussion of cumulative impacts and how they are being analyzed within this Draft Program EIR.

Impacts are analyzed and the respective assessment and findings are included in this Draft Program EIR, applying the following levels of significance:

- **No impact.** A conclusion of no impact is reached if no potential exists for impacts.
- **Less than significant impact.** This determination applies if the impact does not exceed the defined significance criteria or would be eliminated or reduced to a less than significant level through compliance with existing local, State, and federal laws and regulations. No mitigation is required for impacts determined to be less than significant.
- **Less than significant impact with mitigation.** This determination applies if the Housing Element Update would result in a significant impact, exceeding the established significance criteria, but feasible mitigation is available that would reduce the impact to a less than significant level.
- **Significant and unavoidable impact.** This determination applies if the Housing Element Update would result in an adverse impact that exceeds the established significance criteria, and no feasible mitigation is available to reduce the impact to a less than significant level. Therefore, the residual impact would be significant and unavoidable.
- **Significant and unavoidable impact with mitigation.** This determination applies if the Housing Element Update would result in an adverse impact that exceeds the established significance criteria, and, although feasible mitigation might lessen the impact, the residual impact would be significant, and, therefore, the impact would be unavoidable.

Impacts are defined in terms of their context and intensity. Context is related to the uniqueness of a resource; intensity refers to severity of the impact. Where applicable, Best Management Practices (BMPs) are incorporated to limit potential for a significant impact. Where necessary, mitigation measures are identified for significant impacts to limit the degree or lower the magnitude of the impact; rectify the impact by repairing, rehabilitating, or restoring the affected environment; or compensating for the impact by replacing or providing substitute resources or environments. These impacts conclude with a finding of less than significant impact with mitigation. Where no mitigation measures are necessary, relevant impacts are concluded to be less than significant or to have no impact.

As part of the impact analysis, mitigation measures are identified, where feasible, for impacts considered significant or potentially significant consistent with CEQA Guidelines Section 15126.4, which states that an EIR “shall describe feasible measures which could minimize significant adverse impacts.” CEQA requires that mitigation measures have an essential nexus and be roughly proportional to the significant impact identified in the EIR.

Approval of the Housing Element Update does not constitute a commitment to any specific development. It is contemplated that some future site-specific approvals may be evaluated with consideration of the certified Final Program EIR under CEQA. Review of site-specific applications would require analysis by City staff as a part of the entitlement and/or design review process for some future projects. Accordingly, individual development proposals consistent with the Housing Element Update would need to implement all applicable mitigation measures as identified in the Mitigation Monitoring and Reporting Program (MMRP) adopted with the Final Program EIR. Pursuant to CEQA Guidelines Section 15126.4, mitigation measures are not required for environmental impacts that are found not to be significant.

Impacts are numbered and shown in bold type. The corresponding mitigation measures, where identified, are numbered, indented, and follow the impact statements. Impacts and mitigation measures are numbered consecutively within each topic and include an abbreviated reference to the impact section (e.g., “LAND” for Land Use and Planning). The following abbreviations are used for individual topics:

- Aesthetics (AES)
- Agriculture and Forestry Resources (AG)
- Air Quality (AIR)
- Biological Resources (BIO)
- Cultural Resources and Tribal Cultural Resources (CUL)
- Energy (ENER)
- Geology and Soils (GEO)
- Greenhouse Gas Emissions (GHG)
- Hazards and Hazardous Materials (HAZ)
- Hydrology and Water Quality (HYD)
- Land Use and Planning (LAND)
- Noise (NOI)
- Population and Housing (POP)

- Public Services and Recreation (PSR)
- Transportation (TRANS)
- Utilities and Service Systems (UTIL)
- Wildfire (WILD)

3.4 - Cumulative Impacts

The discussion of cumulative impacts in this Draft Program EIR analyzes cumulative impacts of the Housing Element Update, taken together with other past, present, and reasonably foreseeable future projects producing related impacts. The goal of this analysis is to determine whether overall long-term impacts of all such projects would be cumulatively significant and to determine whether the Housing Element Update itself would cause a “cumulatively considerable” incremental contribution to any such cumulatively significant impacts. To determine whether the overall long-term impacts of all such projects would be cumulatively significant, the analysis generally considers the following:

- The area in which impacts would be experienced,
- Other past, proposed, and reasonably foreseeable projects that have had or are expected to have impacts in the same area,
- The impacts or expected impacts of these other projects,
- The impacts of the proposed project that are expected in the area, and
- The overall impact that can be expected if the individual impacts from each project are allowed to accumulate.

“Cumulative impacts” refers to two or more individual impacts that, when considered together, are considerable, or that compound or increase other environmental impacts (CEQA Guidelines § 15355). Cumulative impacts can result from individually minor but collectively significant impacts taking place over time (CEQA Guidelines § 15355(b)). If the analysis determines that potential exists for the Housing Element Update, taken together with other past, present, and reasonably foreseeable future projects, to result in a significant or adverse cumulative impact, the analysis then determines whether the Housing Element Update’s incremental contribution to any significant cumulative impact is itself significant (i.e., “cumulatively considerable”). Both conditions must apply for the project’s cumulative effects to rise to the level of significance.

The cumulative impact analysis for each individual resource topic is presented in each resource section immediately after the description of direct project impacts and identified mitigation measures.

The geographic scope of the cumulative impact analysis is the Tri-Valley Planning Area, which includes the City of Pleasanton as well as the surrounding cities of Dublin, Livermore, and San Ramon and the Town of Danville.

3.5 - Impact Analysis and Mitigation Measure Format

The format adopted in this Draft Program EIR to present the evaluation of impacts is described and illustrated below.

Summary Heading of Impact

Impact AES-1: An impact summary heading appears immediately preceding the impact description (Summary Heading of Impact in this example). The impact number identifies the section of the report (AES for Aesthetics in this example) and the sequential order of the impact (1 in this example) within that section. To the right of the impact number is the impact statement, which identifies the potential impact.

A narrative analysis follows the impact statement. If applicable, design features that would fully or partially reduce the impact are included in the discussion. In some cases, state and federal regulations and agency policies that would fully or partially reduce the impact are included in the discussion. In addition, policies and programs from applicable local land use plans that partially or fully reduce the impact may be cited.

Level of Significance Before Mitigation

This section identifies the level of significance of the impact before any mitigation is proposed.

Mitigation Measures

If impacts remain potentially significant after the application of design features, existing regulations and application of relevant policies and programs, feasible mitigation measures will be explored. Mitigation measures, beyond existing regulatory requirements, are set off with a summary heading and described using the format presented below:

MM AES-1 Programmatic mitigation is identified that would reduce the impact to the lowest degree feasible. The mitigation number links the particular mitigation to the impact it is associated with (**AES-1** in this example); mitigation measures are numbered sequentially.

Level of Significance After Mitigation

This section identifies the resulting level of significance of the impact following mitigation.

Abbreviations used in the mitigation measure numbering are:

Code	Environmental Issue
AES	Aesthetics
AG	Agriculture and Forestry Resources
AIR	Air Quality
BIO	Biological Resources

Code	Environmental Issue
CUL	Cultural Resources and Tribal Cultural Resources
ENER	Energy
GEO	Geology and Soils
GHG	Greenhouse Gas Emissions
HAZ	Hazards and Hazardous Materials
HYD	Hydrology and Water Quality
LAND	Land Use and Planning
NOI	Noise
POP	Population and Housing
PSR	Public Services and Recreation
TRANS	Transportation
UTIL	Utilities and Service Systems
WILD	Wildfire

3.1 - Aesthetics

3.1.1 - Introduction

This section of the Draft Program Environmental Impact Report (Draft Program EIR) addresses potential environmental effects related to aesthetics, light, and glare on the potential sites for rezoning and surrounding areas resulting from implementation of the proposed 2023-2031 (6th Cycle) Housing Element Update, rezonings, General Plan and Specific Plan Amendments (collectively referred to herein as the Housing Element Update). Future projects consistent with the Housing Element Update will be evaluated for project-specific impacts related to aesthetics, light, and glare at the time they are proposed.

Descriptions and analysis in this section are based, in part, on a review of the City of Pleasanton General Plan (General Plan), Vineyard Avenue Corridor Specific Plan, Hacienda PUD Development Plan Guidelines, Scenic Highway Plan for Interstate 680 in the City of Pleasanton (Scenic Highway Plan), and the Pleasanton Municipal Code (Municipal Code). Once the Housing Element Update is adopted, the General Plan would be amended to include the Housing Element Update. Therefore, all references to the General Plan include the Housing Element Update.

3.1.2 - Environmental Setting

Visual Character

Visual character in the California Environmental Quality Act (CEQA) context is an impartial description of the defining physical features, landscape patterns, and distinctive physical qualities within a landscape. Visual character is informed by the composition of land, vegetation, water, and structure and their relationship (or dominance) to one another, and by prominent elements of form, line, color, and texture that combine to define the composition of views. Visual character-defining resources and features within a landscape may derive from notable landforms, vegetation, land uses, building design and façade treatments, transportation facilities, overhead utility structures and lighting, historic structures or districts, or panoramic open space.

City of Pleasanton

The city is characterized as relatively flat, sloping gently in all directions toward the surrounding hills, as discussed further below. The city's existing character includes a low-density residential community surrounded by business parks and shopping centers in a relatively vegetated setting, with historic and more compact urban design elements in its central downtown area, the historic center of the city. The visual characteristics of the downtown area consist of local serving uses, historic buildings, the greenway along Arroyo del Valle, and city parks. The city's historic Downtown Area contains older residential neighborhoods and mixed commercial areas centered around Main Street, with an abundance of street trees. The Pleasanton arch, located along Main Street at Division Street, is an iconic feature of the city and the downtown. The Alameda County Fairgrounds lies just southwest of the historic downtown.

The street patterns of the city vary from the traditional grid of the downtown to more typically suburban subdivision cul-de-sac patterns of housing developments built since the 1960s. Broad and

curving thoroughfares characterize the circulation within the city's business parks. Newer development along the Interstate 580 (I-580) corridor includes moderate- to high-density residential and transit-oriented development around the Dublin-Pleasanton Bay Area Rapid Transit (BART) station. This newer development introduces taller structures to otherwise low-rise development in the Tri-Valley area.¹

The visual character of the city is further distinguished by the areas of public and private open space and greenways, including parks and landscaping such as the Sports and Recreation Community Park, Val Vista Community Park, Amador Valley Community Park, Augustin Bernal Park, Shadow Cliffs Recreation Area, Pleasanton Ridge Regional Park, Callippe Preserve Golf Course, school playgrounds, and many neighborhood parks. Many of these parks provide focal points that enhance the sense of place within their neighborhoods.² The location of the parks and open space in relation to the potential sites for rezoning is provided in Exhibit 3.13-3 in Section 3.13, Public Services and Recreation.

Scenic Resources

Scenic resources typically involve prominent, unique, and identifiable natural features in the environment (e.g., trees, rock outcroppings, islands, ridgelines, channels of water, and aesthetically appealing open space) and cultural features or resources (e.g., regional or architecturally distinctive buildings, or structures that serve as a focal point of interest).

City of Pleasanton

The scenic resources within the city contribute to the quality of the community. Pleasanton is located within the eastern valley area of Alameda County, mostly within the Amador Valley. The Amador Valley is one of the three valleys included in the Tri-Valley area, which is ringed by the Diablo Range of hills. There are hills, including the Pleasanton and Main Ridges, located to the west of the valley. The Trampas Ridge is also highly visible to the northwest of the city. Additionally, the Black Hills, which is part of the Diablo Range and includes Mount Diablo, are located to the north of the city (Exhibit 3.1-1). These prominent landforms define the high points in the landscape of the Tri-Valley area and provide a scenic backdrop for all development in the valley floor portions of the city.

Water features provide a natural contrast to the predominantly urban and suburban development pattern of the Tri-Valley area, which is largely defined by commercial, residential, and industrial structures, and parking areas, highways and roadways within the cities that make up the Tri-Valley area. The major watercourse features in the city include Arroyo de la Laguna, Arroyo del Valle, Arroyo Mocho, Alamo Canal, Chabot Canal, and Tassajara Creek. Shadow Cliffs Lake and the Chain of Lakes are former quarry gravel pits, located at the eastern edge of the city. Portions of the Chain of Lakes are outside the city limits, but within the City's SOI. Other nearby water features include Alameda Creek, Arroyo las Positas, Lake Del Valle, Arroyo Seco, Altamont Creek, and Collier Canyon Creek. The most established riparian communities within the city are found along Arroyo del Valle,

¹ City of Pleasanton. 2008. Proposed Pleasanton General Plan Draft Environmental Impact Report.

² Ibid.

Arroyo Mocho, and Arroyo de la Laguna. Most other creeks within the city have been culverted and/or channelized, so vegetation around them tends to be sparser.³

The General Plan references several city entryways, which provide an indication to the viewer that one is entering the City of Pleasanton or a distinct area of the city. The relevant entryways are provided below.

Interstate 580 Freeway Entryways

The Hacienda Drive area provides views of the large Hacienda Business Park entry arch. Sites 5 (Laborer Council), 7 (Hacienda Terrace), 9 (Metro 580), and 29 (Oracle) are within the Hacienda Business Park, and Site 9 (Metro 580) is to the northeast of the entry arch, which is located south of the freeway offramp. As Hopyard Road and Santa Rita Road continue toward Downtown, they include elements of strong visual interest, consisting of street and median trees.

Interstate 680 Freeway Entryways

The I-680 entryways provide a relative softness of appearance and landscape quality. The Sunol Boulevard entry provides informal landscaping and a relative absence of development, which provides the road a soft, semi-rural feel. Sites 23 (Sunol Boulevard) and 24 (Sonoma Drive Area) are approximately 0.6 mile north of the Sunol Boulevard entry. The Stoneridge Drive entry provides landscaping and includes a bridge structure over the Alamo Canal. Sites 4 (Owen, Motel 6 and Tommy T), 5 (Laborer Council), and 6 (Signature Center) are approximately 0.6 mile northeast of the Stonebridge Drive entry.

Foothill Road Entryway

From the northern entryway south of I-580, rural vistas are provided to the west and office development is to the east, which is generally well screened with landscaping. Site 2 (Stoneridge Shopping Center, Mall) is just to the east of the Foothill Road northern entryway.

Vineyard Avenue Entryway

Vineyard Avenue is in a semi-rural area bordered by hills and open space. The vineyard planting and wineries in the area, including the Ruby Hills Winery at the intersection of Vineyard and Isabel Avenue; reinforces the “wine country” character of this area. Site 27 (PUSD-Vineyard) is within the Vineyard Avenue Corridor Specific Plan Area.

Scenic Routes/Viewsheds

Views may be generally described as panoramic views of a large geographic area, for which the field of view can be wide and extend into the distance. Associated vantage points provide an orientation from publicly accessible locations. Examples of distinctive views include urban skylines, valleys, mountain ranges, or large bodies of water.

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The generally undeveloped hillside and ridge line areas enclosing the city to the west and south create an attractive backdrop and serve as a physical and visual separator from other nearby

³ City of Pleasanton. 2008. Proposed Pleasanton General Plan Draft Environmental Impact Report.

communities. The scenic views available to the city include distant views of Mount Diablo to rural farmland views of both flatland areas and surrounding hillsides. Mount Diablo is the most noticeable visual feature, rising to an elevation of 3,849 feet above sea level. It is a prominent landmark dominating the northern skyline.⁴

The Pleasanton Ridgeland areas are areas of special visual interest that include approximately 13,000 acres and are generally bounded by I-580 to the north, the 670-foot elevation near Foothill Road to the east, Niles Canyon Road to the south and Palomares Road to the west. The hillside areas include the Pleasanton, Main, and Southeast Hills. Measure F, passed in November of 1993, protects the existing visual quality of the Pleasanton Ridgeland areas. Similarly, Measures PP and QQ, passed in November 2008, preserves hillside and ridge views in the hill areas.

Scenic routes are intended to preserve or enhance road corridors that provide scenic views. The California Scenic Highway Program was implemented to preserve and protect scenic highway corridors from changes that would diminish the aesthetic value of lands adjacent to State highways. A scenic highway designation protects the scenic values of an area and can enhance community identity and pride. Scenic highways provide a passive recreational opportunity to observe scenic vistas. I-680, from where it meets SR-24 near Walnut Creek to where it meets SR-238 in Fremont, is an officially designated State Scenic Highway and traverses the western portion of the city in the north-south direction.⁵ Additionally the Scenic Highway Plan⁶ was adopted in 1985 and supplements California's Scenic Highway Program by providing more specific implementation measures to protect State and locally designated scenic roadways. SR-84, from where it meets SR-238 in Fremont to where it meets the I-680 in Sunol, is also an officially designated State Scenic Highway.⁷

Additionally, I-580, from where it meets I-80 in San Francisco to where it meets I-205 in Tracy, is an eligible but not officially designated State Scenic Highway; it traverses the northern city boundary in an east-west direction.⁸ I-680, I-580 (between Palomares and Foothill Roads), and SR-84 feature wooded hillsides, valleys, and other open space qualities. I-580, between Foothill and El Charro Roads, provides mostly urbanized views with landscaping. However, since the 1980s, the I-680 and I-580 corridors have experienced increasing urbanization, reducing the transition and distinction between the cities of the Tri-Valley.⁹ The officially designated and eligible State Scenic Highways are provided in Exhibit 3.1-2.

⁴ City of Pleasanton. 2008. Proposed Pleasanton General Plan Draft Environmental Impact Report.

⁵ California Department of Transportation (Caltrans). 2018. California State Scenic Highway System Map. Website: <https://caltrans.maps.arcgis.com/apps/webappviewer/index.html?id=465dfd3d807c46cc8e8057116f1aaca>. Accessed May 25, 2022.

⁶ City of Pleasanton. 1985. Scenic Highway Plan for Interstate 680 In the City of Pleasanton (Scenic Highway Plan).

⁷ California Department of Transportation (Caltrans). 2018. California State Scenic Highway System Map. Website: <https://caltrans.maps.arcgis.com/apps/webappviewer/index.html?id=465dfd3d807c46cc8e8057116f1aaca>. Accessed May 25, 2022.

⁸ Ibid.

⁹ City of Pleasanton. 2008. Proposed Pleasanton General Plan Draft Environmental Impact Report.

Light and Glare

In the context of this analysis, consistent with the CEQA Guidelines, light is considered nighttime illumination that stimulates sight and makes things visible, and glare is considered to be difficulty seeing in the presence of bright light such as direct or reflected sunlight.

City of Pleasanton

Sources of light and glare surrounding the potential sites for housing include those which are associated with public infrastructure residential, office, commercial, and industrial developments in the city, including vehicle headlights on public roadways, overhead lights in parking lots and along public streets, and building and parking security lighting.

3.1.3 - Regulatory Framework

State

California Scenic Highway Program

The State Legislature created the California Scenic Highway Program, maintained by the California Department of Transportation (Caltrans), in 1963. The officially designated and eligible State Scenic Highways are provided in Exhibit 3.1-2. The purpose of the State Scenic Highway Program is to protect and enhance the natural scenic beauty of California highways and adjacent corridors, through special conservation treatment. The California Scenic Highway Program is intended to preserve and protect scenic highway corridors from change that would diminish aesthetic value of highway lands. A highway may be designated scenic depending upon how much of the natural landscape can be seen by travelers, scenic quality of the landscape, and the extent to which development intrudes upon travelers' enjoyment of the view. The State laws governing the Scenic Highway Program are found in the Streets and Highways Code, Sections 260 through 263. A highway may be designated scenic depending upon how much of the natural landscape can be seen by travelers, the scenic quality of the landscape, and the extent to which development intrudes upon the traveler's enjoyment of the view. The State Scenic Highway System includes a list of highways that are either eligible for designation as scenic highways or have been officially designated. The status of a proposed State Scenic Highway changes from eligible to officially designated when the local governing body applies to Caltrans for Scenic Highway approval, adopts a Corridor Protection Program, and receives notification that the highway has been officially designated a Scenic Highway.

Title 24 of the California Code of Regulations Building Energy Efficiency Standards

California Building Code (California Code of Regulations [CCR], Title 24)—including Title 24, Part 6—includes Section 132 of the Building Energy Efficiency Standards, which regulates lighting characteristics, such as maximum power and brightness, shielding, and sensor controls to turn lighting on and off. Different lighting standards are set by classifying areas by lighting zone. The classification is based on population figures of the 2010 Census. Areas can be designated as LZ1 (dark), LZ2 (rural), or LZ3 (urban). Lighting requirements for dark and rural areas are stricter, to protect the areas from the introduction of new sources of light pollution and light trespass.

Local

City of Pleasanton General Plan

The General Plan, adopted in 2009 and last amended in August 2019, contains the following relevant policies and actions that assist in reducing or avoiding impacts related to aesthetics, light, and glare:

Land Use Element

The Land Use Element, Chapter 2 of the General Plan, provides policies and a land use map indicating the planned location, amount, and intensity of residential, commercial, and industrial lands and provides guidance for the use of public and open space lands.

- Goal 2** Achieve and maintain a complete well-rounded community of desirable neighborhoods, a strong employment base, and a variety of community facilities.
- Policy 8** Preserve and enhance the character of existing residential neighborhoods.
- Program 8.1** Enforce the provisions of the City’s Zoning Ordinance and related planning ordinances to maintain the character of existing residential neighborhoods.
- Program 8.2** Use the City’s development review procedures to minimize intrusions into existing neighborhoods.
- Policy 9** Develop new housing in infill and peripheral areas which are adjacent to existing residential development, near transportation hubs or local serving commercial areas.
- Zone vacant infill sites at densities to facilitate development, which includes affordable housing, while respecting the character of surrounding uses.
- Policy 10** Provide flexibility in residential development standards and housing type consistent with the desired community character.
- Program 10.1** Use Planned Unit Development (PUD) zoning for residential properties that have unique characteristics or to accommodate development that does not fit under standard zoning classifications.
- Policy 21** Preserve scenic hillside and ridge views of the Pleasanton Ridgelines and Southeast Hills ridges (Measure QQ).
- Program 21.1** Continue to implement the land-use and development standards of the Pleasanton Ridgelines Initiative of 1993 (Measure F).
- Program 21.2** Study the feasibility of preserving large open space acreage in the Southeast Hills by a combination of private open space and a public park system (Measure QQ).
- Program 21.3** Ridgelines and hillsides shall be protected. Housing units and structures shall not be placed on slopes of 25 percent or greater, or within 100 vertical feet of a ridgeline.

No grading to construct residential or commercial structures shall occur on hillside slopes 25 percent or greater, or within 100 vertical feet of a ridgeline. Exempt from this policy are housing developments of 10 or fewer housing units on a single property. Splitting, dividing, or subdividing a “legal parcel” to approve more than 10 housing units is not allowed (Measure PP, Nov. 2008).

Conservation and Open Space Element

The Conservation and Open Space Element, Chapter 7 of the General Plan, provides guidance to conserve and manage natural resource and open space areas for the preservation, production, and enjoyment of natural and cultural resources and promote open space recreation, protection of public health and safety, and preservation of valuable wildlands.

- Goal 1** Practice sustainability to preserve and protect natural resources and open space.
- Goal 6** Achieve an extensive open space system featuring a wide variety of opportunities to serve the diverse needs of the public.
- Policy 8** Preserve as permanent open space all areas of outstanding scenic qualities or areas which provide extraordinary views of natural and human-made objects.
- Program 8.1** Implement the recommendations contained in the Scenic Highway Plan for I-680.
- Program 8.2** Retain the scenic attributes of existing (I-680) and proposed scenic highways (I-580 and State Route 84) including views of woodlands, hills and ridges, valleys, and grazing lands.
- Program 8.3** Along freeway corridors, use setbacks, landscaping, and architecturally integrated screen walls to screen views of parking lots, loading docks, and service and storage areas.
- Program 8.4** Encourage developers to work with entities such as the Tri-Valley Conservancy to dedicate scenic/conservation easements for private open space areas possessing exceptional natural, scenic, and/or vegetation or wildlife habitat qualities.

Community Character Element

The Community Character Element, Chapter 12 of the General Plan, identifies the physical and social aspects of city’s unique identity and establishes goals, policies, and programs to preserve and enhance those aspects which make the city special and distinct.

- Goal 1** Preserve and enhance Pleasanton’s community character.
- Goal 4** Enhance the appearance of major city entryways.
- Policy 7** Improve the visual quality of entryways to Pleasanton.

- Program 7.1** As part of the design review process, encourage the installation of distinctive landscaping, and discourage advertising signage and bright franchise colors at major street entryways to the City.
- Program 7.2** The City should be particularly sensitive to aesthetic considerations when land-use planning in areas adjacent to City entryways.
- Program 7.3** Design and install City identification signs at major entryways to the City.
- Program 7.4** Give the Hopyard/I-580 area a high priority for visual improvement when making land-use and public investment decisions.
- Goal 5** Enhance streetscapes and areas near the freeways.
- Policy 9** Enhance landscaping along city streets and the freeways.
- Program 9.1** Complete and infill the street tree and median landscaping along streets, when feasible.
- Program 9.2** When the opportunity arises and when feasible, add landscaped parkway strips along street edges to soften their appearance and improve the pedestrian experience.
- Program 9.3** Increase the width of existing narrow parkway strips when the opportunity arises and encourage applicants of new developments to provide parkway strips which are at least 6-10 feet wide.
- Program 9.4** Install landscaped instead of paved medians and replace paved medians with landscaped medians wider than 6 feet, whenever possible and feasible.
- Program 9.5** In new developments, require developers, owners' associations, or maintenance associations to maintain landscaped medians.
- Program 9.6** Provide landscaping to soften the visual appearance of existing and new walls and fences that abut city streets, whenever possible and feasible.
- Program 9.7** Require additional setbacks and screening of development adjacent to a freeway.
- Program 9.8** Work with Caltrans to enhance landscaping along the freeways.
- Program 9.9** Along streets, work with developers and property owners to place a greater emphasis on the use of native plant species and on pruning techniques which allow species to appear more as they would in a natural setting, especially in larger planting areas.
- Goal 6** Preserve and enhance the city's commercial areas and residential neighborhoods.

Policy 15 Encourage new commercial area development and redevelopment, including stand-alone retail buildings, restaurants, and hotels, to incorporate attractive architectural and site design features.

Program 15.3 Require developers to include the following features, as feasible, in the development of new and the redevelopment of existing commercial areas:

- Pedestrian amenities such as landscaping, benches, trellises, fountains, public art, and attractive lighting
- Pedestrian walkways and bikeway connections that create safe paths of travel through the shopping center and parking, and to transit, nearby sidewalks, and surrounding residential neighborhoods
- Attractive sign design and higher quality sign materials
- Outdoor seating, shade structures, and drinking fountains
- Decorative paving at driveway entrances and pedestrian areas
- Attractive colors, minimizing bright franchise colors
- Higher quality façade materials
- Orientation of buildings to transit facilities, where applicable
- Shared parking
- Attractive and convenient bicycle parking

Policy 17 Maintain, enhance, and protect the quality, character, and distinctiveness of residential neighborhoods.

Program 17.1 In existing and new residential areas, where such principles will not conflict with surrounding development patterns or the physical conditions of the site, encourage the use of traditional residential neighborhood planning which incorporates the following design features:

- Usable front porches
- 6- to 10-foot-wide parkway strips
- Large canopy street trees
- Home fronts facing the street, instead of walls abutting streets
- Minimal garage presence
- Narrower streets
- Pathways to parks, schools, and other neighborhoods
- Neighborhoods open and accessible to one another

Program 17.2 In high-density developments, encourage design treatments that enhance the attractiveness of the streetscape and other publicly accessible areas through architectural detail, neighborhood and public gathering areas, gardens, and public art.

Program 17.3 Work with PG&E to underground power lines in existing residential neighborhoods, when the opportunity arises.

- Program 17.4** In older neighborhoods, schedule the maintenance and replacement of public improvements, such as pavement and streetlights, commensurate in quality and appearance to those in more recently constructed neighborhoods.
- Policy 18** Evaluate land-use changes in the context of overall City welfare and goals, as well as the desires of the surrounding neighborhoods.
- Program 18.1** When evaluating development proposals or changes in land use consider General Plan and Specific Plan policies, Zoning and Subdivision Ordinance standards, existing land uses, environmental impacts, safety, and resident, merchant and property owner concerns.
- Program 18.2** Require appropriate buffers, edges, and transition areas between dissimilar land uses and neighborhoods.
- Program 18.3** Through the City’s review process, address issues of privacy, proximity and orientation.
- Goal 7** Preserve the open space character at the edges of the city.
- Policy 20** Preserve scenic hillside and ridge views, and other natural features in the hills.
- Program 20.1** Continue to support the Pleasanton Ridgeland Initiative of 1993 (Measure F).
- Program 20.2** In new developments, preserve scenic hillsides and other hillside features including ridges, plants, streams, and wildlife.

Housing Element

The Housing Element is the primary tool used by the State to ensure local governments are appropriately planning for and accommodating enough housing across all income levels for the planning period 2023-2031. The Housing Element is a mandatory part of a jurisdiction’s General Plan, but it differs from other General Plan elements in two key aspects: (1) it must be updated every eight years for jurisdictions within a Metropolitan Planning Organization (MPO), such as the Association of Bay Area Governments (ABAG); and (2) it must also be reviewed and approved by the California Department of Housing and Community Development (HCD) to ensure compliance with statutory requirements. Goals, policies, and programs regarding aesthetics in the Housing Element are provided in Chapter 2, Project Description, specifically, Goals 4 and 6, Policies 4.1 and 6.1, 6.3, and Programs 4.2 and 6.1 provide guidance for aesthetics.

Hacienda PUD Development Plan Design Guidelines

The Hacienda Planned Unit Development (PUD) area is generally located south of Interstate 580 (I-580), west of Tassajara Creek, north of W. Las Positas Boulevard, and east of Hopyard Road. The Hacienda PUD Development Plan Design Guidelines (Hacienda Design Guidelines) ensure that development within the Hacienda PUD area is within the best interests of the public’s health, safety, and general welfare, is consistent with the General Plan, compatible with existing developed properties, presents a positive image for the city along the I-580 frontage, and development within

the Hacienda PUD area conform to the purpose of the PUD. Parcel 5D corresponds to Site 5 (Laborer Council), Parcel 9 corresponds to Site 7 (Hacienda Terrace), Parcel 18B to Site 8 (Muslim Community Center), Parcel 58C to Site 9 (Metro 580), and Parcel 56C corresponds to Site 29 (Oracle).

Section 1.4 provides a description of residential housing site development, which “seek to promote residential development at densities that support work force housing that are compatible with Pleasanton’s existing high-quality neighborhoods,” and Section 1.5 specifies the design review process. Chapter 2 provides site planning guidelines including land use planning and zoning; site zone definitions; site design and open space; front, side, and rear yard designations; building and parking area setbacks; internal circulation; parking area requirements; architectural guidelines; development standards for housing and TOD sites; and lighting guidelines. Section 2.10 includes architectural guidelines, which provides guidelines for building design, building mounted equipment screening, and prohibited materials, among other standards. Section 2.11 includes development standards for housing and TOD sites and Section 2.12 provides lighting guidelines. Chapter 4 provides signing guidelines.

Vineyard Avenue Corridor Specific Plan

The Vineyard Avenue Corridor Specific Plan includes the 384-acre area along Vineyard Avenue in southeast Pleasanton. The Vineyard Avenue Corridor Specific Plan establishes a unique environment which includes a variety of agricultural, residential, open space, recreational, educational, and other uses. Objectives, policies, and guidelines regarding aesthetic resources in the Vineyard Avenue Corridor Specific Plan include:

Land Use Objectives

1. Establish a mix of land uses that promote the Plan Area as the western entry to the Livermore Valley wine country and provide an appropriate transition between the existing urbanized edge of Pleasanton to the west and the Ruby Hill development to the east.
7. Preserve the major ridgeline in the southern Plan Area, limit development of hilltop areas to homes that can be substantially screened from off-site areas, and limit hillside development to areas that can be physically and visually accommodate it without disrupting the natural character of the site.
8. Ensure that future development of the hilly areas located south of Vineyard Avenue is designed to emphasize the rural character through careful siting of buildings, minimal disruption to the physical terrain, and sensitive architectural and landscape treatments.
9. Establish a unified site planning, architectural, and landscape character for the future development of Lots 18, 19, 21, and 28 that draws from the character of the Livermore Valley wine country, the approved Ruby Hill architectural design concepts, and the traditions of Southern European “vineyard village” design.

Scenic Highway Plan for Interstate 680 in the City of Pleasanton

The Scenic Highway Plan, adopted in 1985, supplements the State’s Scenic Highway Program by providing more specific implementation measures to protect State and locally designated scenic roadways. In 1985 when the Scenic Highway Plan was adopted, I-680, between I-580 and Sunol

Boulevard, was the portion of roadway recognized as a scenic highway for its views of agricultural lands, open space, native vegetation, and hillsides which surround the Pleasanton Valley.

According to the Scenic Highway Plan, there are three special features in the planning area, which contribute to the State Scenic Highway designation of the I-680 corridor:

1. Dense stands of vegetation, to 50 feet or more in height, comprised of mixed species including eucalyptus, acacias, pines, oleanders, peppers and sycamore trees. This non-irrigated growth consists of largely drought tolerant, mostly evergreen, native species and/or species that are compatible with the native growth.
2. Large spans of open space viewed either across the existing Alamo Canal, the stream channel of the Arroyo de la Laguna or across undeveloped parcels of land. These areas, also unirrigated, feature mostly wild grasses and riparian vegetation broken up by occasional stands of eucalyptus or poplar trees. In addition, there are areas of agricultural land within the I-680 viewshed.
3. Views to Mount Diablo, the Pleasanton Ridge and hillsides which surround the Pleasanton Valley. Particularly on the west side of the freeway, the closer range is dotted with occasional homes, farms, and California live oak trees set in the native grasses. These elements dominate the view and are distinctive features of the Pleasanton Valley corridor.

The Scenic Highway Plan's implementation program for scenic corridors includes general standards and policies involving land uses, structural design, signs and advertising, utility lines, earthwork, vegetation, and property management. The following goals, objectives, and policies apply to the Housing Element Update:

Goal 1 To preserve scenic quality along I-680

- A. Preserve existing large stands of vegetation along the highway
- B. Preserve and encourage continued views to the surrounding hills
- C. Preserve open space vistas along I-680

Policy 4.2.2 Sound Walls

- d. General
 - Sound walls should be placed as far from the travel way as possible
 - Where possible, earth berms can be used for noise attenuation instead of or in conjunction with sound walls to reduce the apparent wall height
 - Sound walls should be in muted tones that blend into the background
 - The horizontal or linear character of the wall should be emphasized, with the vertical posts de-emphasized and painted the same color as the body of the wall

Policy 4.2.3 Landscape

d. General

- Landscaping along I-680 should be designed and maintained to provide added visual interest, frame scenic views, and screen unsightly views.
- Existing specimens, heritage trees, and significant shrub masses should be preserved.
- Additional planting can occur where scenic views will not be obscured from the highway, or where planting can be designed with a profile that is low enough to allow views over.
- Selective clearing also can be done in order to reveal important views from the highway
- At sound walls, planting should be used wherever possible to soften the man-made edge character.

D. New Development

- Significant vegetation should be preserved through setback requirements and site planning.
- New development sound walls should be set back from the highway or Zone 7 right-of-way a minimum of 20 feet to allow adequate space for planting and/or landscape berms and can vary to follow the development edge.
- While there can be some degree of variety in the planting along the various project edges, there also should be certain plants materials used along the I-680 corridor to create a feeling of continuity.
- To preserve views of the surrounding mountains, foothills, and open spaces, the majority of new planting should consist of small trees, shrubs and vines, with only intermittent use of taller trees types.
- Care should be taken, as well, that tall trees within new developments are set back far enough from the highway to avoid blocking views of the distant mountains.
- Planting, particularly groundcovers, and irrigation should be selected and designed to blend at its edges with adjacent unirrigated natural open spaces.

Policy 4.2.4 Future Land Use

d. Industrial/Commercial Land Use

- In the future, new development should be set back a minimum of 100 feet from the Caltrans right-of-way.
- Ancillary uses, such as parking lots, loading docks, service areas and storage materials, should be screened from view by means of landscape and/or a combination of landscape and architecturally integrated screen walls.
- Planting should be concentrated around the building and/or screened areas and should not form a wall of vegetation against the highway's edge.

- New office or commercial uses should be clustered to provide a varied texture that blends well within the scenic corridor.

B. Residential land uses

- In the future, new development also should be required to design walls and planting in accordance with the color palettes, planting lists, and concepts discussed in the Scenic Highway Plan.

Policy 4.3.5 Utilities

- In the future, new utilities should be placed underground, wherever possible.
- Where overhead utility lines are unavoidable, poles, and wires can be located so as to be least conspicuous from the highway. Utility lines should be set back in conformance with Public Utilities Commission No. 80864 to 1,000 feet from the roadway right-of-way.

Policy 4.2.6 Earthwork

- Extensive earthwork should be avoided in this corridor. If there are significant topographic alternations (related to or separate from roadway improvements), earthwork should minimize disturbance to the existing natural ground plane and vegetation, and result in naturalistic or sculptural forms.
- All excavations should be restored and screened with vegetation.
- As the arroyos are an important part of the I-680 viewshed, these waterways should be preserved in their natural condition or treated to attain attractive appearance.
- As a means of preserving natural “ridge skylines,” no major ridgelines should be altered to the extent that an artificial ridgeline results.
- Minor grading to allow construction individual dwellings could be permitted if approved on a site-by-site basis.

Pleasanton Municipal Code

Chapter 17.16 Tree Preservation

The City recognizes that the preservation of trees enhances the natural scenic beauty of the City and encourages quality development. Chapter 17.16 of the Municipal Code regulates the removal and preservation of Heritage trees within the City. A heritage tree is any tree of any species or origin which meets specific criteria specified in Chapter 17.16, including but not limited to, a circumference of 55 inches or more, 35 feet in height, or a historical origin. Any removal of Heritage trees is required to go through City staff review and the development review process.¹⁰

¹⁰ City of Pleasanton Municipal Code. 2022. Title 17 Planning and Related Matters, Chapter 17.16 Tree Preservation. Website: https://library.qcode.us/lib/pleasanton_ca/pub/municipal_code/item/title_17-chapter_17_16-17_16_006. Accessed March 21, 2022.

Chapter 18.20 Design Review

Chapter 18.20 of the Municipal Code requires the review of a variety of development projects, including site plans, landscape plans, building architecture, and other plans and reports, in order to preserve and enhance the city's aesthetic values and ensure the preservation of public health, safety and general welfare.

Chapter 18.28 A Agricultural District

Chapter 18.28 of the Municipal Code prevents a process or use of equipment or materials that produce illumination or glare, which is found to be objectionable to persons residing or working in the vicinity, for areas zoned as A, Agricultural Districts.¹¹

Chapter 18.48 I Industrial Districts

Chapter 18.48 of the Municipal Code prevents any use, except for temporary construction operation, which would create changes in temperature or direct or sky reflected glare, detectable by human senses without the aid of instruments beyond the boundaries of the site, for areas zoned as I, Industrial Districts. It also establishes restrictions on exterior and interior illuminating in relation to a site's boundaries.¹²

Chapter 18.78 West Foothill Road Corridor Overlay District

Chapter 18.78 of the Municipal Code implements the goals and policies of the General Plan as they relate to the rural and open space areas of the Pleasanton Ridgelines.

Chapter 18.88 Off-Street Parking Facilities

Chapter 18.88 of the Municipal Code provides regulations for street parking facilities which includes deflecting parking area illumination and lighting away from residential sites so as to cause no annoying glare.¹³

Chapter 18.96 Signs

Chapter 18.96 of the Municipal Code regulates the location, height, size, and illumination of signs in order to maintain the attractiveness and orderliness of the city's appearance, to protect business sites from loss of prominence resulting from excessive signs on surrounding sites, and to protect the public safety and welfare.¹⁴

¹¹ City of Pleasanton Municipal Code. 2022. Title 18 Zoning, Chapter 18.28 A Agricultural District. Website: https://library.qcode.us/lib/pleasanton_ca/pub/municipal_code/item/title_18-chapter_18_28-18_28_080. Accessed March 21, 2022.

¹² City of Pleasanton Municipal Code. 2022. Title 18 Zoning, Chapter 18.48 I Industrial District. Website: https://library.qcode.us/lib/pleasanton_ca/pub/municipal_code/item/title_18-chapter_18_48-18_48_010. Accessed March 21, 2022.

¹³ City of Pleasanton Municipal Code. 2022. Title 18 Zoning, Chapter 18.88 Off-Street Parking Facilities. Website: https://library.qcode.us/lib/pleasanton_ca/pub/municipal_code/item/title_18-chapter_18_88. Accessed March 21, 2022.

¹⁴ City of Pleasanton Municipal Code. 2022. Title 18 Zoning, Chapter 18.96 Signs. Website: https://library.qcode.us/lib/pleasanton_ca/pub/municipal_code/item/title_18-chapter_18_96. Accessed March 21, 2022.

3.1.4 - Project Impacts and Mitigation Measures

Significance Criteria

The City is using Appendix G of the State CEQA Guidelines as thresholds of significance for the Housing Element Update. To determine whether impacts related to aesthetics are significant environmental effects, the following questions are analyzed and evaluated. Would the Housing Element Update:

- a) Have a substantial adverse effect on a scenic vista?
- b) Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a State Scenic Highway?
- c) In non-urbanized areas, substantially degrade the existing visual character or quality of public views of the site and its surroundings? (Public views are those that are experienced from publicly accessible vantage point). If the project is in an urbanized area, would the project conflict with applicable zoning and other regulations governing scenic quality?
- d) Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area?

Approach to Analysis

This analysis provides a discussion of the visual impacts associated with the Housing Element Update and its potential impacts on the environment at the potential sites for housing and the vicinity. For the purposes of this analysis, an aesthetic impact is measured by the amount of visual change adversely affecting the city's perceived aesthetic value or condition of the setting as defined by the General Plan and other applicable plans and policies. A significant aesthetic impact would include a highly visible change to the project area that is incompatible with the setting or considered to substantially degrade the visual character or quality of the site or its surroundings as a result of the development of any of the potential sites for housing.

Because this analysis evaluates potential sites for housing rather than individual site plans, aesthetic impacts of the Housing Element Update are evaluated based on the proposed size, density, location, and proximity to identified visual resources for each potential site for housing. Additionally, each potential site for housing will be evaluated on a project-by-project basis for aesthetic impacts when a site plan has been developed. All future development would be required to meet design and density standards for the new residential housing at each potential site and would be required to comply with General Plan and Housing Element policies, as well as zoning requirements, and any applicable Specific Plan provisions or other guidelines regarding project design. Additionally, the General Plan, the Vineyard Avenue Corridor Specific Plan, Hacienda Design Guidelines, and Municipal Code were reviewed to determine applicable policies and design requirements for the Housing Element Update.

Light and Glare

The analysis of light and glare impacts in this section focuses on the nature and magnitude of changes in light and glare conditions associated with implementation of the Housing Element Update. Relevant urban design policies, requirements, and guidelines are used to provide conclusions regarding significance of individual- and cumulative-level light and glare impacts.

Impact Evaluation

Scenic Vistas

Impact AES-1: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not have a substantial adverse effect on a scenic vista.

As discussed in Section 3.1.2, Environmental Setting, a scenic vista is generally considered a view of an area that has remarkable scenery or a resource that is indigenous to the area. These scenic resources are primarily part of background views seen at a distance. More specifically, the General Plan generally recognizes hillsides, ridgelines, ridge views, vast open spaces, valleys, arroyos, canals, and city entryways as scenic resources. The city is situated in a tree-covered valley surrounded by generally undeveloped hillsides and ridgelines, which serve as a scenic visual backdrop.¹⁵

The western edge of the city is composed of the Main and Pleasanton Ridges, which provide views of wooded hillsides and ridgelines.¹⁶ Additionally, the Arroyo de Laguna runs along the western edge of I-680. The city's arroyos and canals are considered defining features that open up vistas to distant hills and provide open spaces.¹⁷ The southern edge of the city is primarily characterized as rural, and the views of the undeveloped hillsides to the south of the city are considered important visual resources by the General Plan.¹⁸ The eastern edge of the city is considered largely undeveloped with the exception of the quarry lands, which host sand and gravel operations; however, views of lakes, arroyos, and canals are available to the east of the city, including Arroyo las Positas, Arroyo Mocho, and Arroyo del Valle.^{19, 20} I-580 creates a distinct northern boundary of the city. Views of scenic resources available to the north of the city include background views of the Blackhawk Hills, part of the Diablo Range, and Mount Diablo. Overall, views of the scenic resources surrounding the city could be visible from the potential sites for housing.

Development consistent with the Housing Element Update would result in an impact to scenic vistas if development partially or fully obscured a presently visible scenic vista. If the new development were developed in a manner that obstructs views from a scenic vista from a public area or introduces a visual element that would dominate, diminish, or upset the quality of a view, this would create a significant impact on a scenic vista. Development consistent with the Housing Element Update could result in increased intensity, increased height, and greater bulk and mass of buildings.

¹⁵ City of Pleasanton. 2009. General Plan, Community Character Element, Overview.

¹⁶ City of Pleasanton. 2009. General Plan, Community Character Element, Edge Environment.

¹⁷ City of Pleasanton. 2009. General Plan, Community Character Element, Arroyos and Canals.

¹⁸ City of Pleasanton. 2009. General Plan, Community Character Element, Edge Environment.

¹⁹ Ibid.

²⁰ City of Pleasanton. 2009. General Plan, Water Element, Figure 8-2, Existing Surface Water Resources.

However, as presented in Section 3.1.3, Regulatory Framework, the City has adopted extensive policies and programs that protect scenic vistas and other scenic resources and guide the integration of new development with the natural environment. Consistent with these policies and programs, all future development would be required to undergo the design review process. As described in the Municipal Code, Chapter 18.20, the design review process is intended to preserve and enhance the city's aesthetic values and to ensure the preservation of the public health, safety, and general welfare. A design review application is reviewed to ensure it reflects a proper relationship to the site and surrounding areas and consistency with the Municipal Code, approved plans and/or guidelines, and City policies/standards. The design review process allows the City to review all aspects of a project, including the layout, landscaping, parking, building massing and architecture, colors and/or materials, illumination, amenities, and community impacts.²¹ As stated in the Municipal Code, the design review process specifically analyzes whether a proposed development would preserve the natural beauty of the city and views enjoyed by residents, workers within the city, and passersby throughout the community. This process would ensure that all proposed development would not significantly impact views of available scenic resources. Chapter 18.78 of the Municipal Code implements the goals and policies of the General Plan as they relate to the rural and open space areas of the Pleasanton Ridgelines. Though none of the potential sites for housing are within the West Foothill Road Corridor Overlay District, Site 22 (Merritt) shares a frontage with Foothill Road. Section 18.78.070 provides regulations for any frontage road adjacent to Foothill Road. The City would review and future development projects, including Site 22 (Merritt), to ensure they abide by the regulations set forth in Chapter 18.78, as applicable, which would serve to protect views of the Pleasanton Ridgelines.

All future development consistent with the Housing Element Update would be required to comply with the policies and actions of the General Plan, as well as the Vineyard Avenue Corridor Specific Plan, and Hacienda Design Guidelines where applicable, which are designed to protect view corridors, scenic resources, and natural features. Consistent with the General Plan, Land Use Element Policies 8 and 10 and Community Character Element Policies 15 and 17, design features for future development of all uses would complement the adjacent properties and draw on their surroundings to ensure compatibility. Further, consistent with the General Plan, Land Use Element Policy 21 and Community Character Element Policy 20, special emphasis would be placed on site plans, setbacks, building height, massing, and scale of future development to ensure that scenic hillsides and ridge views surrounding the city are preserved. Policy 4.1 of the Housing Element Update would result in the development of guidelines and standards for residential and mixed-use development that would incorporate objective standards whenever possible which would ensure future projects are attractive and well-designed which would also ensure scenic hillsides and ridges are preserved (Program 4.2).

With respect to the sites zoned for densities above 30 dwelling units per acre, which includes the Dublin-Pleasanton BART station property, Program 6.1 requires the City to adopt Objective and Design and Development Standards. These standards would ensure that these properties are developed at appropriate height limits, with compatible Floor Area Ratio, setbacks, massing, open space and parking requirements. These standards also include approval criteria to ensure that

²¹ City of Pleasanton. 2022. Pleasanton Municipal Code, Chapter 18.20 Design Review.

projects can accomplish their assigned densities, while mitigating potential incompatibilities between those higher density projects and adjacent uses, such as view corridors, scenic resources, and natural features by implementing standards such as height limits, Floor Area Ratio, setbacks, massing, open space and parking requirements.

Site 27 (PUSD-Vineyard) is located within the Vineyard Avenue Corridor Specific Plan area. Therefore, all future development at that site would be consistent with Land Use Objective 8, which ensures that all future development is designed to emphasize the rural character through careful siting of buildings, minimal disruption to the physical terrain, and sensitive architectural and landscape treatments.

Most of the potential sites for housing are located within urban, previously developed areas. All of the sites, aside from Sites 1 (Lester) and 22 (Merritt), are located within the incorporated area. Site 22 (Merritt) is just outside of city limits, but within Pleasanton's Sphere of Influence (SOI) and Urban Growth Boundary (UGB). Site 1 (Lester) is also located just outside of city limits; however, the western half of Site 1 (Lester) is located just outside the UGB. Both Site 1 (Lester) and Site 22 (Merritt) abut the Pleasanton Ridgelines to the west and would have the greatest opportunity to interrupt publicly accessible scenic views of the Ridgelines. However, both of these sites would be designated as low-density sites, which would reduce intensity and bulkiness near the ridgelines. Additionally, Site 2 (Stoneridge Shopping Center, Mall) is located along the west side of the I-680 corridor and is currently an underutilized parking lot. Site 2 (Stoneridge Shopping Center, Mall) would be designated as a high-density site. Development of this site would increase intensity and height at this site, and due to its proximity to the ridgelines, could also impact publicly accessible views of scenic vistas of the ridgelines. However, as discussed above, all future development at these sites would be subject to design review and would comply with the Municipal Code and the General Plan, which would ensure that scenic vistas are protected. Therefore, the goals, policies, and programs included as part of the General Plan, applicable zoning requirements, design guidelines and Vineyard Avenue Corridor Specific Plan, would ensure that the city's scenic resources, including hillsides and ridgelines, would largely be protected from impacts resulting from development facilitated by the Housing Element Update. At the programmatic level, aesthetic impacts to scenic vistas would be less than significant. Individual development projects would be required to undergo project-specific environmental review, which may require additional site-specific or project-specific measures to reduce any potential impacts and would ensure that impacts remain less than significant.

Level of Significance

Less than significant impact.

Scenic Highways

Impact AES-2:	Development consistent with Housing Element Update, rezonings, General Plan and Specific Plan Amendments would not substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic building within a State Scenic Highway.
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As discussed in Section 3.1.2, Environmental Setting, scenic routes are intended to preserve or enhance road corridors that provide scenic views. Section 3.1.2 also describes the officially designated and eligible State Scenic Highways, which are provided in Exhibit 3.1-2.

As discussed in Impact AES-1, the city is surrounded by various scenic resources, including hillsides, ridge views, vast open spaces, valleys, arroyos, and canals. Many of these resources are visible from the eligible and officially designated State Scenic Highways that have been identified as in or near the city. A significant impact would occur if future development consistent with the Housing Element Update would impact or obstruct views of the city's scenic resources from the eligible or officially designated State Scenic Highways.

Of the potential sites for housing, Site 22 (Merritt) is located directly adjacent to and west of I-680 and future development consistent with the Housing Element Update would be fully visible from the highway. Sites 1 (Lester) and 2 (Stoneridge Mall) are located west of I-680 between the highway and the Pleasanton Ridgeland, and Pleasanton Ridgeland is partially visible from the highway. Therefore, development on Sites 1 (Lester) and 2 (Stoneridge Shopping Center, Mall) that is consistent with the Housing Element Update could partially obstruct views from this officially designated State Scenic Highway. As previously discussed, both Sites 1 (Lester) and 22 (Merritt) would be designated as low-density sites and Site 2 (Stoneridge Shopping Center, Mall) would be designated as a high-density site, which represents an increase in intensity at these sites from existing conditions. Additionally, Sites 9 (Metro 580), 11 (Old Santa Rita Area), 12 (Pimlico Area), and 29 (Oracle) and the Dublin-Pleasanton BART station property are located adjacent to I-580, and development consistent with the Housing Element Update would be fully visible from the highway. All of the sites adjacent to I-580 would be designated as high-density sites, which represents an increase in intensity at each of these sites from existing conditions. SR-84 is also an officially designated State Scenic Highway near the city; however, none of the potential sites for housing are located within the highway corridor.

As previously discussed, all future development consistent with the Housing Element Update would be required to go through design review, as outlined in Municipal Code Chapter 18.20, which would ensure that development would be constructed in such a way as to not obstruct views of scenic resources from the State Scenic Highways. Additionally, all future development consistent with the Housing Element Update would be required to comply with applicable General Plan policies, including Land Use Element Policy 21, which preserves scenic hillsides and ridge views in the city and Conservation and Open Space Element Policy 8. This policy includes Program 8.2, which specifically preserves the scenic attributes of existing and proposed scenic highways including views of woodlands, hills and ridges, valleys, and grazing lands; and Program 8.1, which requires implementation of the recommendations contained in the Scenic Highway Plan for I-680. Thus, all future development consistent with the Housing Element Update would be required to comply with the Scenic Highway Plan. Moreover, the sites located near I-580 would be within areas already subject to relatively dense development, and in some cases, adjacent to existing tall commercial buildings; in this context, and with application of applicable design guidelines, potential visual impacts would be limited.

Overall, the policies contained within the Scenic Highway Plan aim to preserve existing large stands of trees and vegetation along the State Scenic Highways and preserve existing views of hillsides and open spaces available from the State Scenic Highways. The majority of the potential sites for rezoning are already developed or partially developed with urbanized uses, or are relatively small sites, completely surrounded by urbanized uses. However, Sites 1 (Lester), 3 (PUSD-Donlon), 14 (St. Elizabeth Seton), 21a and b (Kiewit), 22 (Merritt), 26 (St. Augustine), 27 (PUSD-Vineyard), 29 (Oracle) and portions of Site 24 (Sonoma Drive) are vacant. Out of the currently vacant sites, only Site 22 (Merritt) is within the I-680 corridor and, given the historical and current uses, does not contain large stands of vegetation that would be impacted by future development.

As the City receives development applications for subsequent development consistent with the Housing Element Update, those applications would be reviewed by the City for compliance with the goals, policies, and programs of the General Plan, applicable specific plans, applicable zoning requirements, design guidelines, and the Scenic Highway Plan, and compliance with these standards would ensure development consistent with the Housing Element Update would not substantially damage scenic resources within view of a State Scenic Highway and impacts would be less than significant.

Level of Significance

Less than significant impact.

Consistency with Scenic Quality Regulations and Visual Character

Impact AES-3: **Development consistent with Housing Element Update, rezonings, General Plan and Specific Plan Amendments would not, in non-urbanized areas, substantially degrade the existing visual character or quality of public views of the site and its surroundings. (Public views are those that are experienced from publicly accessible vantage point). Development consistent with Housing Element Update, rezonings, General Plan and Specific Plan Amendments would not, in urbanized areas, conflict with applicable zoning and other regulations governing scenic quality.**

As previously discussed, all the sites, aside from Sites 1 (Lester) and 22 (Merritt), are located within the incorporated area. Site 22 (Merritt) is just outside of city limits, but within Pleasanton's SOI and UGB. Site 1 (Lester) is also located just outside of city limits; however, the western half of Site 1 (Lester) is located just outside the UGB. Thus, Site 1 (Lester) is partially located in a non-urbanized area. Therefore, because development consistent with the Housing Element Update could include sites in both urbanized areas and non-urbanized areas, this impact analysis addresses both consistency with regulations governing scenic quality, as well as changes to existing visual character and quality.

Consistency with Scenic Quality Regulations

As previously stated, the potential sites for housing, aside from Site 1 (Lester), are located in an urbanized area. The existing and proposed general plan land use and zoning designations for the sites are presented in Table 2-9 in Chapter 2. Exhibits 2-4a and 2-4b in Chapter 2, Project Description,

provide the existing general plan and zoning designations, respectively, and Exhibits 2-5a and 2-5b provide the proposed general plan and zoning designations, respectively.

The potential sites for housing are mostly vacant or underutilized parcels, currently developed with a mix of uses including surface parking lots, restaurants, hotels, office buildings, retail, industrial, and warehouse and distribution. The existing land use designations for these sites include residential, commercial, industrial, office, mixed use, community facilities, agriculture, public health and safety, parks and recreation, and public and institutional. The existing zoning designations include agriculture, residential, commercial, office, mixed use, industrial, public and institutional.

Several of the sites are within Planned Unit Development districts, and as part of the Housing Element Update, the potential sites for rezoning would be rezoned to allow for residential development under a PUD district. To the extent projects may be subject to review through the PUD process, the PUD zoning would provide flexibility in residential development standards and housing types, in conjunction with the applicable design standards established by the City with the intent of ensuring well-designed and attractive projects that minimize aesthetics impacts.

As previously discussed, all future development consistent with the Housing Element Update would be required to go through design review, as outlined in Municipal Code Chapter 18.20, which would ensure that development does not conflict with or diminish the existing scenic quality. Additionally, all future development would be required to comply with applicable General Plan policies that protect scenic quality, including Land Use Element Policy 8, which requires that all future development preserve and enhance the character of the existing residential neighborhoods, specifically by requiring compliance with the City's zoning ordinance and design review process as identified in the associated Programs 8.1 and 8.2. Policy 4.1 of the Housing Element Update would result in the development of guidelines and standards for residential and mixed-use development that would incorporate objective standards whenever possible which would ensure future projects are attractive and well-designed (Program 4.2).

With respect to the sites zoned for densities above 30 dwelling units per acre, which includes the Dublin-Pleasanton BART station property, Policy 6.1 requires those properties to be dispersed throughout the community. As described in Chapter 2, Project Description, the potential sites for rezoning were chosen based on seven criteria, and as shown in Exhibit 2-3, the high-density sites are dispersed throughout the city. Program 6.1 requires the City to adopt Objective and Design and Development Standards that would ensure those properties are developed at appropriate height limits, with compatible Floor Area Ratio, setbacks, massing, open space and parking requirements, and approval criteria to ensure projects can accomplish their assigned densities, while mitigating potential incompatibilities between those higher density projects and adjacent uses by implementing standards such as height limits, Floor Area Ratio, setbacks, massing, open space and parking requirements. All properties zoned for densities above 30 dwelling units per acre would be required to comply with these standards, which would be confirmed during design review.

Site 27 (PUSD-Vineyard) is the western portion of Lot 19 as designated in the Vineyard Avenue Corridor Specific Plan. Site 27 (PUSD-Vineyard) would comply with Land Use Objective 9 of the Vineyard Avenue Corridor Specific Plan, which requires the establishment of unified site planning,

architectural, and landscape development that draws from the character of the Livermore Valley wine country, the approved Ruby Hill architectural design concepts, and the traditions of the Southern European “vineyard village” design. Compliance with this objective would be confirmed during the design review process.

Additionally, development consistent with the Housing Element Update would be subject to Measure PP, which protects the natural and scenic environment by limiting placement of residential development on sites with slopes greater than 25 percent. Aside from Site 1 (Lester), the potential sites for housing are relatively flat, urban infill sites and several of them are currently developed. These sites are not located near slopes of 25 percent or greater or within 100 vertical feet of a ridgeline and they are not near scenic hillsides. Thus, Measure PP would not be applicable to these sites. Site 1 (Lester) may contain slopes of 25 percent or be within 100 feet of a ridgeline. Pursuant to Measure PP and Program 21.3 of Chapter 2, Land Use Element, of the General Plan, no development within Site 1 (Lester) would occur on slopes of 25 percent or greater or within 100 vertical feet of a ridgeline.

Development consistent with the Housing Element Update would also be subject to Measure QQ, which aims to (A) preserve scenic hillside and ridge views of specific ridges (i.e., Pleasanton, Main, and Southeast Hills); (B) study the feasibility of preserving large open space areas in the Southeast Hills; and (C) protect large contiguous areas designated as Open Space in the General Plan. As previously described, views of Pleasanton ridge and other scenic hillsides and ridge views may be available from some of the potential sites for rezoning, as those scenic hillsides and ridge views are at a number of locations throughout Pleasanton; however, the design review process and application of existing and future design guidelines and standards, would help to preserve those views and ensure development would not conflict with or diminish the existing scenic quality. Furthermore, none of the sites include large open space areas in the Southeast Hills or are designated as Open Space in the General Plan. Pursuant to Measure QQ and Policy 21 of Chapter 2, Land Use Element, of the General Plan, development consistent with the Housing Element Update would occur in such as a way as to preserve scenic hillsides and ridge views. Once the City receives development applications for development consistent with the Housing Element Update, they would be reviewed by the City for compliance with the goals, policies, and programs of the General Plan, including Program 21.3 (Measure PP) and Policy 21 (Measure QQ). On this basis, the Housing Element Update would not conflict with Measure PP and Measure QQ.

Therefore, on a programmatic level, development consistent with the Housing Element Update would have a less than significant impact related to scenic quality regulations. Individual development projects would be required to undergo project-specific environmental review, which may require additional site-specific or project-specific measures that would reduce any potential impacts and would ensure that impacts are less than significant.

Visual Character

The majority of the potential sites for rezoning are already developed or partially developed with urbanized uses, or are relatively small sites, completely surrounded by urbanized uses. Development would not conflict with or diminish the existing scenic quality. However, Sites 1 (Lester), 3 (PUSD-Donlon), 14 (St. Elizabeth Seton), 21a and b (Kiewit), 22 (Merritt), 26 (St. Augustine), 27 (PUSD-

Vineyard), 29 (Oracle) and portions of Site 24 (Sonoma Drive) are vacant. Introduction of new residential uses would have the potential to alter the visual character of these potential sites for housing. All future development consistent with the Housing Element Update would be required to comply with applicable General Plan policies that protect visual character, including Land Use Element Policy 8, which requires that all future development preserve and enhance the character of the existing residential neighborhoods, specifically by requiring compliance with the City's zoning ordinance and design review process as identified in the associated Programs 8.1 and 8.2. The Community Character Element contains several policies intended to preserve and enhance the city's character. All future development consistent with the Housing Element Update would be required to incorporate attractive architectural and site design features, as detailed in Policy 15. Further, in compliance with Program 17.1, future development consistent with the Housing Element Update would be designed to not conflict with surrounding development patterns or the physical conditions of a site.

All future high-density development would be required to include design treatments that enhance the attractiveness of the streetscape and other publicly accessible areas through architectural detail, neighborhood and public gathering areas, gardens, and public art, in compliance with Program 17.2. Policy 4.1 of the Housing Element Update would result in the development of guidelines and standards for residential and mixed-use development that would incorporate objective standards to ensure future projects are attractive and well-designed, which, in turn, would ensure compatibility with the existing visual character (Program 4.2).

Additionally, the potential sites for rezoning were determined through a site evaluation performed by the City and were chosen to promote infill development in areas with proximity to existing transit and services and amenities, consistent with General Plan Land Use Element Policy 9.

Development consistent with the Housing Element Update would be required to comply with Vineyard Avenue Corridor Specific Plan and Hacienda Design Guidelines, as applicable, designed to ensure development is consistent with the existing visual character.

As previously discussed, all future development consistent with the Housing Element Update would be required to go through design review, as outlined in Municipal Code Chapter 18.20, which would ensure that development does not conflict with or diminish the existing visual character.

Compliance with General Plan policies and programs and adherence to development and design standards in the Municipal Code and Vineyard Avenue Corridor Specific Plan and Hacienda Design Guidelines would ensure that future development projects consistent with the Housing Element Update are cohesive, appropriately designed in terms of potential aesthetic impacts, and reflect the character of the city. At the programmatic level, aesthetic impacts to the quality of public views in non-urbanized areas would be less than significant. Consistent with the General Plan policies and programs, individual development projects would be required to undergo project-specific environmental review, which may require additional site-specific or project-specific measures to reduce any potential impacts to the quality of public views in non-urbanized areas and would ensure that impacts would be less than significant.

Level of Significance

Less than significant Impact.

Light and Glare

Impact AES-4: Development consistent with the Housing Element Update, rezonings, General Plan and Specific Plan Amendments would not create a new source of substantial light or glare which would adversely affect day or nighttime views in the area.

Development consistent with the Housing Element Update could introduce artificial light from new development and outdoor parking areas. Examples of light and glare include streetlights, freestanding lights, building-mounted lights, reflective building materials, and vehicular headlights. Currently, developed portions of the surrounding area contain numerous existing sources of light and glare, including streetlamps and exterior residential lights.

The potential sites for housing are mostly vacant or underutilized parcels, currently developed with a mix of uses including surface parking lots, restaurants, hotels, office buildings, retail, industrial, and warehouse and distribution. Of these sites, Sites 1 (Lester), 3 (PUSD-Donlon), 14 (St. Elizabeth Seton), 21a and b (Kiewit) 22 (Merritt), 26 (St. Augustine), 27 (PUSD-Vineyard), 29 (Oracle) and portions of Site 24 (Sonoma Drive) are vacant. Development of these sites would represent a change in the level of light and glare present at these sites. However, all future development would be required to comply with the applicable light and glare standards in the Municipal Code, including those stated in Section 18.20.030, which requires that design review evaluate the relationship of exterior lighting to its surroundings and to the building and adjoining landscape, as well as those included in Chapter 18.88, which requires that any off-street parking provided in future development not interfere with adjacent residential development.

Additionally, development consistent with the Housing Element Update would be subject to the requirements set forth by the California Energy Code (Title 24, Part 6 CCR). Compliance with the applicable lighting and energy requirements established by the California Energy Code would ensure that light and glare associated with future development would not spillover onto adjacent land uses. Specifically, California Code of Regulations, Section 132 of Title 24, Part 6, regulates lighting characteristics such as maximum power and brightness, shielding, and sensor controls to turn lighting on and off. These standards require that outdoor lighting be automatically controlled so that it is turned off during daytime hours and during other times when not needed. Therefore, with adherence to the aforementioned requirements, impacts associated with light would be less than significant.

Level of Significance

Less than significant impact.

3.1.5 - Cumulative Impacts

The cumulative context for visual quality encompasses all other areas that are visible in the views of the potential sites for housing. Thus, the geographic scope of the cumulative impact analysis for aesthetics is the immediate vicinity of the identified potential sites for housing, as well as the rest of

the City and surrounding cities of Dublin, Livermore, and San Ramon and the Town of Danville. This analysis evaluates whether the impacts of the development of projects consistent with the Housing Element Update, together with the impacts of cumulative development, would result in a cumulatively significant impact on aesthetics and visual quality. This analysis then considers whether the incremental contribution to cumulative impacts associated with the implementation of the Housing Element Update would be significant. Both conditions must apply for a project's cumulative effects to rise to the level of significance.

Visual Character and Views

The potential sites for housing, the rest of the City, and the surrounding cities included in this cumulative analysis are primarily urbanized and built out. Future development in the cumulative context would include predominantly infill residential, commercial, and industrial development consistent with the General Plans of each municipality. The geographic area contains many natural features such as hillsides and ridgelines, as well as extensive open spaces, arroyos, and canals. Future development would be subject to the design review processes of the individual jurisdiction, and the applicable land use plans containing policies and implementing programs to preserve visual character, land use compatibility, and views in those jurisdictions. For these reasons, cumulative impacts related to aesthetics would be less than significant.

All future development consistent with the Housing Element Update and cumulative development would be subject to specific regulations and guidelines related to building heights, setbacks, undergrounding of utilities, landscaping, signage, and permitted land uses. These regulations would ensure that visual character and viewsheds are maintained and/or enhanced. Therefore, the Housing Element Update's contribution would not be cumulatively considerable. As such, the Housing Element Update, in conjunction with other planned and approved projects, would result in a less than significant cumulative impact with respect to visual character and views.

Light and Glare

All cumulative development would consist primarily of infill development, which could increase light and glare in the geographic area. Cumulative development could include streetlights, exterior lighting, safety lighting, lighting from vehicles, and sources of glare from the buildings and vehicles. Local regulations related to light and glare would be applicable to all cumulative development; therefore, cumulative impacts would be less than significant.

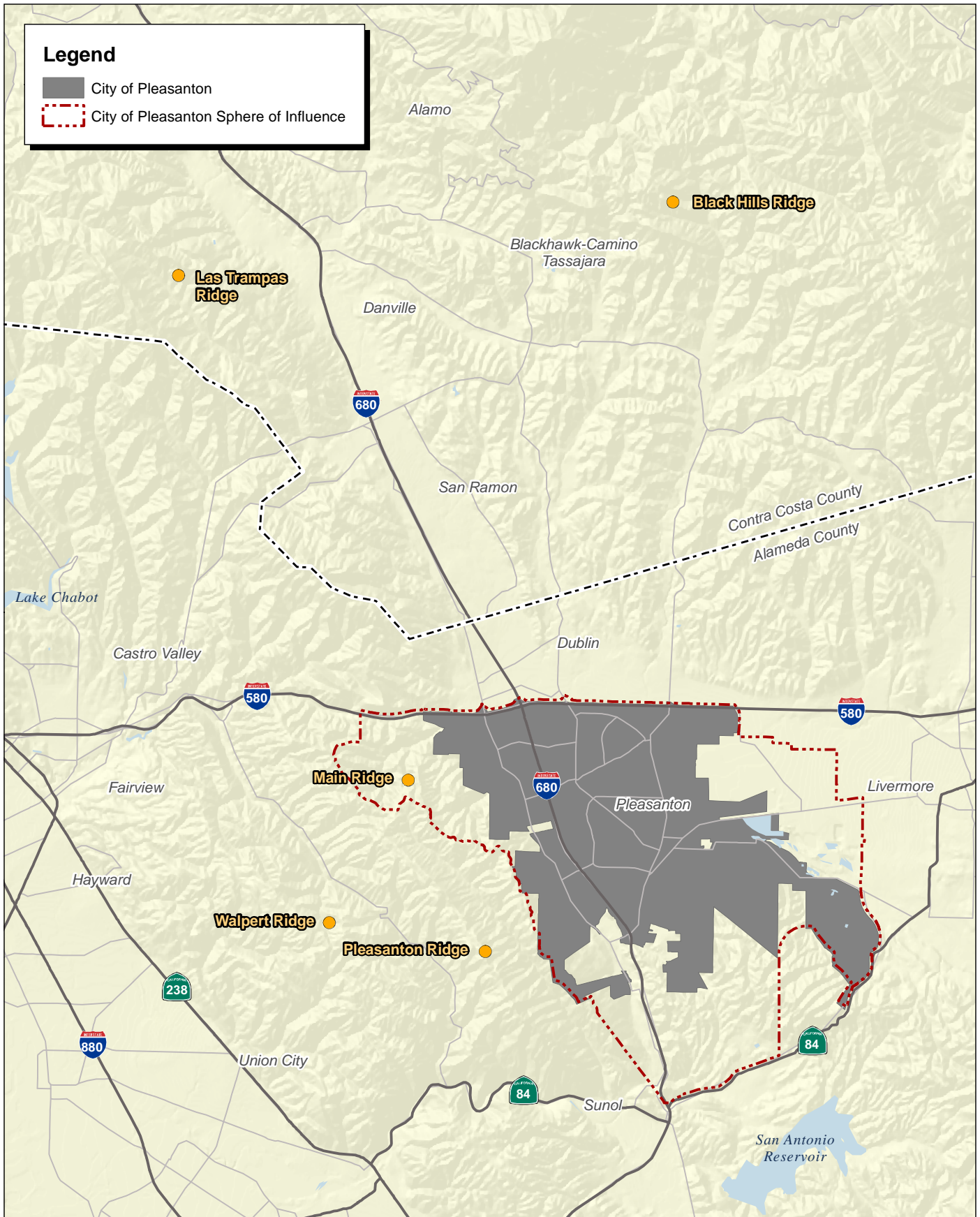
Lighting and exterior building materials associated with the Housing Element Update and cumulative development would be subject to administrative design review by the various jurisdictions. This process would ensure appropriate building materials are utilized, building windows are tinted to minimize interior light transmission, and exterior lighting is designed so that it is directed downward and away from adjacent properties. All future development consistent with the Housing Element Update and cumulative development would increase light and glare compared to existing conditions. However, adherence to the administrative design review process and standards of each applicable jurisdiction would minimize the light and glare impacts for the Housing Element Update and cumulative development. Therefore, the Housing Element Update's contribution would not be cumulatively considerable. As such, all future development consistent with the Housing Element

Update, in conjunction with other planned and approved projects, would result in a less than significant cumulative impact with respect to light and glare.

Level of Cumulative Significance

Less than significant impact.

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Source: Census 2000 Data, The California Spatial Information Library (CaSIL). City of Pleasanton.

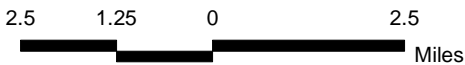
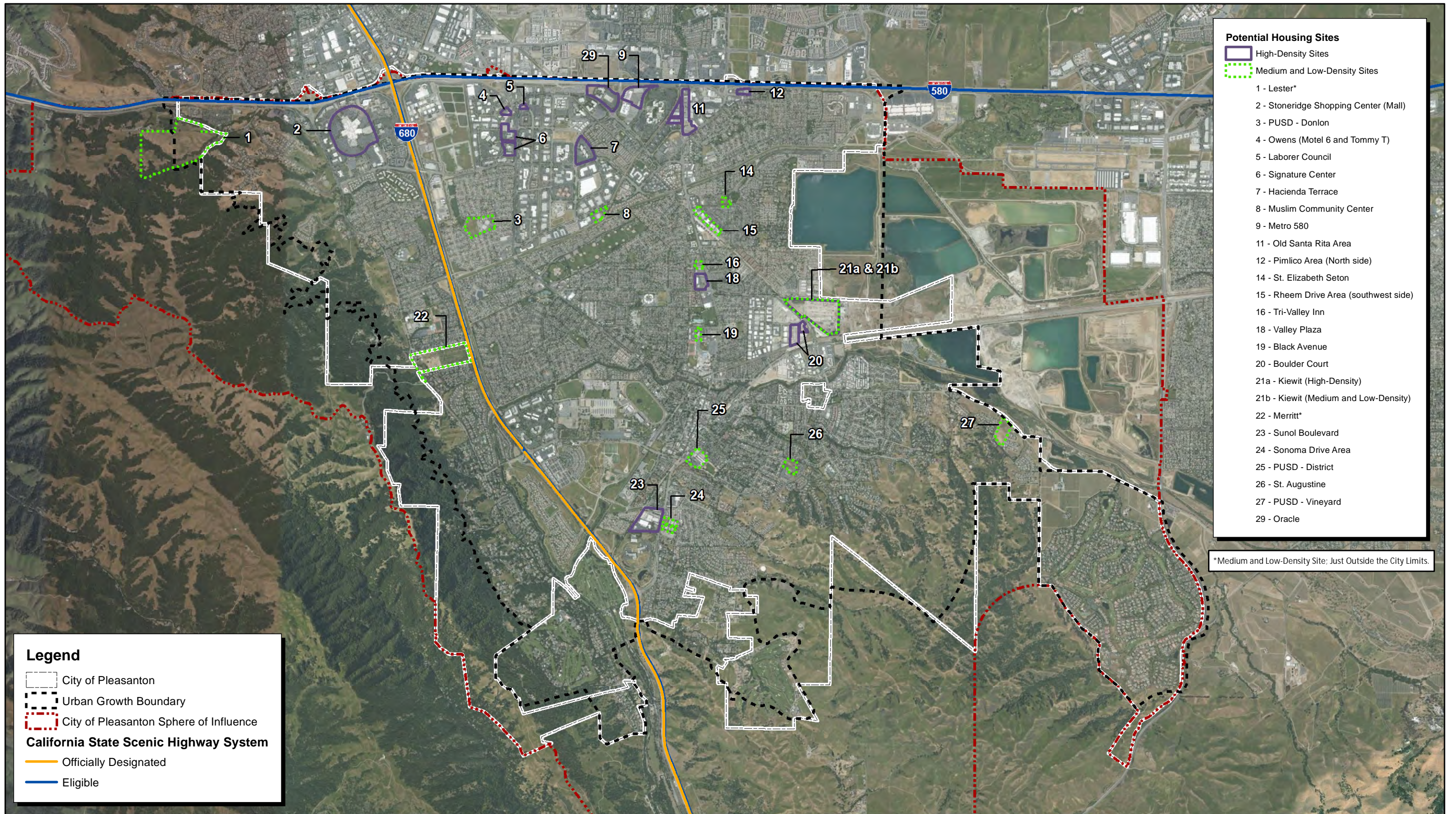


Exhibit 3.1-1 Ridge Map

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Source: Bing Aerial Imagery, City of Pleasanton, California Department of Transportation (Caltrans).



Exhibit 3.1-2
Officially Designated and Eligible State Scenic Highways

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3.2 - Air Quality

This section describes existing air quality conditions regionally and locally as well as the relevant regulatory framework. This section also addresses potential environmental effects related to air quality from implementation of the proposed 2023-2031 (6th Cycle) Housing Element Update, rezonings, General Plan and Specific Plan Amendments (collectively referred to herein as the Housing Element Update). Future projects consistent with the Housing Element Update will be evaluated for project-specific impacts related to air quality at the time they are proposed. Information included in this section is based, in part, on project-specific air quality modeling results utilizing California Emissions Estimator Model (CalEEMod) Version 2020.4.0. Complete modeling output is provided in Appendix C.

3.2.1 - Environmental Setting

Regional Geography and Climate

Atmospheric conditions such as wind speed, wind direction, and air temperature gradients interact with the physical features of the landscape to determine the movement and dispersal of air pollutants.

The proposed Housing Element Update is for the City of Pleasanton (City), which is within the boundaries of the San Francisco Bay Area Air Basin (SFBAAB). The SFBAAB encompasses the nine-county region including all of Alameda, Contra Costa, Santa Clara, San Francisco, San Mateo, Marin, and Napa counties and the southern portions of Solano and Sonoma counties. The climate of the Bay Area is determined largely by a high-pressure system that is almost always present over the eastern Pacific Ocean off the West Coast of North America. During winter, the Pacific high-pressure system shifts southward, allowing more storms to pass through the region. During summer and early fall, when few storms pass through the region, emissions generated within the Bay Area can combine with abundant sunshine under the restraining influences of topography and subsidence inversions to create conditions that are conducive to the formation of photochemical pollutants, such as ozone, and secondary particulates, such as nitrates and sulfates.

More specifically, the proposed Housing Element Update cover is within the Livermore Valley climatological subregion. According to the Bay Area Air Quality Management District (BAAQMD), the western side of the Livermore Valley is bordered by 1,000 to 1,500 foothills with two gaps connecting the Livermore Valley to the central Bay Area, the Hayward Pass, and Niles Canyon. The eastern side of the Livermore Valley is also bordered by 1,000 to 1,500 foothills with one major passage to the San Joaquin Valley called the Altamont Pass and several secondary passages. To the north of the Livermore Valley lie the Black Hills and Mount Diablo. A northwest to southeast channel connects the Diablo Valley to the Livermore Valley. The south side of the Livermore Valley is bordered by mountains approximately 3,000 to 3,500 feet high.¹

¹ Bay Area Air Quality Management District (BAAQMD). 2017. Bay Area Air Quality Management District CEQA Air Quality Guidelines.

During the summer months, when there is a strong inversion with a low ceiling,² air movement is weak, and pollutants become trapped and concentrated. Maximum summer temperatures in the Livermore Valley range from the high 80°F (degrees Fahrenheit) to the low 90°F, with extremes in the 100°F range. At other times in the summer, a strong Pacific high-pressure cell from the west, coupled with hot inland temperatures, causes a strong onshore pressure gradient which produces a strong, afternoon wind. With a weak temperature inversion, air moves over the hills with ease, dispersing pollutants. In the winter, with the exception of an occasional storm moving through the area, air movement is often dictated by local conditions. At night and in the early morning, especially under clear, calm, and cold conditions, gravity drives cold air downward. The cold air drains off the hills and moves into the gaps and passes. On the eastern side of the Livermore Valley the prevailing winds blow from the north, northeast, and east out of the Altamont Pass. Winds are light during the late night and early morning hours. Winter daytime winds sometimes flow from the south through the Altamont Pass to the San Joaquin Valley. Average winter maximum temperatures range from the high 50s to the low 60s, while minimum temperatures range from the mid to high 30s, with extremes in the high teens and low 20s.

Air pollution potential is high in the Livermore Valley, especially for photochemical pollutants in the summer and fall. High temperatures increase the potential for ozone to build up. The Livermore Valley not only traps locally generated pollutants but can be the receptor of ozone and ozone precursors from San Francisco, Alameda, Contra Costa, and Santa Clara counties. On northeasterly wind flow days, most common in early autumn, ozone may be carried west from the San Joaquin Valley to the Livermore Valley. During the winter, the sheltering effect of the Livermore Valley, its distance from moderating water bodies, and the presence of a strong high-pressure system contribute to the development of strong, surface-based temperature inversions. Pollutants such as carbon monoxide and particulate matter, generated by motor vehicles, fireplaces, and agricultural burning, can become concentrated.

Air Pollutant Types, Sources, and Effects

Criteria Air Pollutants

Concentrations of criteria air pollutants are used as indicators of air quality conditions. Air pollutants are termed criteria air pollutants if they are regulated by developing specific public health- and welfare-based criteria as the basis for setting permissible levels. According to the United States Environmental Protection Agency (EPA), criteria air pollutants are ozone, particulate matter (PM₁₀ and PM_{2.5}), nitrogen dioxide (NO₂), carbon monoxide (CO), lead, and sulfur dioxide (SO₂). Table 3.2-1 provides a summary of the types, sources, and effects of criteria air pollutants.

² Normally, air temperature decreases with an increase in altitude, but, during an inversion, warmer air is held above cooler air. An inversion traps air pollution, such as smog, close to the ground.

Table 3.2-1: Description of Criteria Pollutants of National and California Concern

Criteria Pollutant	Physical Description and Properties	Sources	Most Relevant Effects from Pollutant Exposure
Ozone	Ozone is a photochemical pollutant as it is not emitted directly into the atmosphere but is formed by a complex series of chemical reactions between volatile organic compounds (VOC), nitrogen oxide (NO _x), and sunlight. Ozone is a regional pollutant that is generated over a large area and is transported and spread by the wind.	Ozone is a secondary pollutant; thus, it is not emitted directly into the lower level of the atmosphere. The primary sources of ozone precursors (VOC and NO _x) are mobile sources (on-road and off-road vehicle exhaust).	Irritate respiratory system; reduce lung function; change breathing pattern; reduce breathing capacity; inflame and damage cells that line the lungs; make lungs more susceptible to infection; aggravate asthma; aggravate other chronic lung diseases; cause permanent lung damage; induce some immunological changes; increase mortality risk; damage to vegetation and property.
Particulate matter (PM ₁₀) Particulate matter (PM _{2.5})	Suspended particulate matter is a mixture of small particles that consist of dry solid fragments, droplets of water, or solid cores with liquid coatings. The particles vary in shape, size, and composition. PM ₁₀ refers to particulate matter that is between 2.5 and 10 microns in diameter, (one micron is one-millionth of a meter). PM _{2.5} refers to particulate matter that is 2.5 microns or less in diameter, about one-thirtieth the size of the average human hair.	Suspended particulate matter sources include fuel or wood combustion for electrical utilities, residential space heating, and industrial processes; construction and demolition; the use of metals, minerals, and petrochemicals; wood products processing; mills and elevators used in agriculture; erosion from tilled lands; waste disposal and recycling. Mobile or transportation-related sources are from vehicle exhaust and road dust. Secondary particles form from reactions in the atmosphere.	<ul style="list-style-type: none"> • Short-term exposure (hours/days): irritation of the eyes, nose, throat; coughing; phlegm; chest tightness; shortness of breath; aggravate existing lung disease, causing asthma attacks and acute bronchitis; those with heart disease can suffer heart attacks and arrhythmias. • Long-term exposure: reduced lung function; chronic bronchitis; changes in lung morphology; death.
Nitrogen dioxide (NO ₂)	During combustion of fossil fuels, oxygen reacts with nitrogen to produce nitrogen oxides—NO _x (NO, NO ₂ , NO ₃ , N ₂ O, N ₂ O ₃ , N ₂ O ₄ , and N ₂ O ₅). NO _x is a precursor to ozone, PM ₁₀ , and PM _{2.5} formation. NO _x can react with compounds to form nitric acid and related small particles and can result in PM-related health effects.	NO _x are produced in motor vehicle internal combustion engines and fossil fuel-fired electric utility and industrial boilers. Nitrogen dioxide forms quickly from NO _x emissions. NO ₂ concentrations near major roads can be 30 to 100 percent higher than those at monitoring stations.	Potential to aggravate chronic respiratory disease and respiratory symptoms in sensitive groups; risk to public health implied by pulmonary and extra-pulmonary biochemical and cellular changes and pulmonary structural changes; contributions to atmospheric discoloration; increased visits to hospital for respiratory illnesses.

Criteria Pollutant	Physical Description and Properties	Sources	Most Relevant Effects from Pollutant Exposure
Carbon monoxide (CO)	CO is a colorless, odorless, toxic gas. CO is somewhat soluble in water; therefore, rainfall and fog can suppress CO conditions. CO enters the body through the lungs, dissolves in the blood, replaces oxygen as an attachment to hemoglobin, and reduces available oxygen in the blood.	CO is produced by incomplete combustion of carbon-containing fuels (e.g., gasoline, diesel fuel, and biomass). Sources include motor vehicle exhaust, industrial processes (metals processing and chemical manufacturing), residential wood-burning, and natural sources.	Ranges depending on exposure: slight headaches; nausea; aggravation of angina pectoris (chest pain) and other aspects of coronary heart disease; decreased exercise tolerance in persons with peripheral vascular disease and lung disease; impairment of central nervous system functions; possible increased risk to fetuses; death.
Sulfur dioxide (SO ₂)	Sulfur dioxide is a colorless, pungent gas. At levels greater than 0.5 parts per million (ppm), the gas has a strong odor similar to rotten eggs. Sulfur oxides (SO _x) include sulfur dioxide and sulfur trioxide. Sulfuric acid is formed from sulfur dioxide, which can lead to acid deposition and can harm natural resources and materials. Although sulfur dioxide concentrations have been reduced to levels well below State and federal standards, further reductions are desirable because sulfur dioxide is a precursor to sulfate and PM ₁₀ .	Human-caused sources include fossil fuel combustion, mineral ore processing, and chemical manufacturing. Volcanic emissions are a natural source of sulfur dioxide. The gas can also be produced in the air by dimethyl sulfide and hydrogen sulfide. Sulfur dioxide is removed from the air by dissolution in water, chemical reactions, and transfer to soils and ice caps. The sulfur dioxide levels in the State are well below the maximum standards.	Bronchoconstriction accompanied by symptoms which may include wheezing, shortness of breath, and chest tightness during exercise or physical activity in persons with asthma. Some population-based studies indicate that the mortality and morbidity effects associated with fine particles show a similar association with ambient sulfur dioxide levels. It is not clear whether the two pollutants act synergistically or one pollutant alone is the predominant factor.
Lead (Pb)	Lead is a solid heavy metal that can exist in air pollution as an aerosol particle component. Leaded gasoline was used in motor vehicles until around 1970. Lead concentrations have not exceeded State or federal standards at any monitoring station since 1982.	Lead ore crushing, lead ore smelting, and battery manufacturing are currently the largest sources of lead in the atmosphere in the United States. Other sources include dust from soils contaminated with lead-based paint, solid waste disposal, and crustal physical weathering.	Lead accumulates in bones, soft tissue, and blood and can affect the kidneys, liver, and nervous system. It can cause impairment of blood formation and nerve conduction, behavior disorders, mental retardation, neurological impairment, learning deficiencies, and low intelligence quotients (IQs).

Criteria Pollutant	Physical Description and Properties	Sources	Most Relevant Effects from Pollutant Exposure
		<p>Sources:</p> <p>California Air Resources Board (ARB). 2021. Vinyl Chloride and Health. Website: https://ww2.arb.ca.gov/resources/vinyl-chloride-and-health. Accessed July 21, 2022.</p> <p>California Office of Environmental Health Hazard Assessment (OEHHA). 2001. Health Effects of Diesel Exhaust. Website: https://oehha.ca.gov/media/downloads/calenviroscreen/indicators/diesel4-02.pdf. Accessed July 21, 2022.</p> <p>National Archives and Records Administration. 2009. Part II, Environmental Protection Agency. 40 Code of Federal Regulations Parts 50 and 58, Primary National Ambient Air Quality Standard for Nitrogen Dioxide; Proposed Rule. July 15. Website: https://www.gpo.gov/fdsys/pkg/FR-2009-07-15/pdf/E9-15944.pdf. Accessed July 21, 2022.</p> <p>National Toxicology Program. 2016. Report on Carcinogens, 15th Edition; U.S. Department of Health and Human Services, Public Health Service. Benzene. November 3.</p> <p>National Toxicology Program. 2016. Report on Carcinogens, 15th Edition; U.S. Department of Health and Human Services, Public Health Service. Diesel Exhaust Particles. November 3.</p> <p>South Coast Air Quality Management District (SCAQMD). 2007. Final 2007 Air Quality Management Plan. June.</p> <p>United States Environmental Protection Agency (EPA). 2016. Nitrogen Dioxide (NO₂) Pollution. Basic Information about NO₂. Website: https://www.epa.gov/no2-pollution/basic-information-about-no2#What%20is%20NO2. Accessed July 21, 2022.</p> <p>United States Environmental Protection Agency (EPA). 2020. Particulate Matter (PM) Pollution. Health and Environmental Effects of Particulate Matter. Website: https://www.epa.gov/pm-pollution/health-and-environmental-effects-particulate-matter-pm. Accessed July 21, 2022.</p> <p>United States Environmental Protection Agency (EPA). 2021. Health Effects Notebook for Hazardous Air Pollutants. Website: https://www.epa.gov/haps/health-effects-notebook-hazardous-air-pollutants. Accessed July 21, 2022.</p> <p>United States Environmental Protection Agency (EPA). 2021. Indoor Air Quality (IAQ). Volatile Organic Compounds' Impact on Indoor Air Quality. Website: https://www.epa.gov/indoor-air-quality-iaq/volatile-organic-compounds-impact-indoor-air-quality. Accessed July 21, 2022.</p> <p>United States Environmental Protection Agency (EPA). 2021. Health Effects of Ozone Pollution. Website: https://www.epa.gov/ground-level-ozone-pollution/health-effects-ozone-pollution. Accessed July 21, 2022.</p>	

Several pollutants listed in Table 3.2-1 are not addressed in this analysis, such as lead, visibility-reducing particles, and vinyl chloride. Analysis of lead is not included in this analysis because no new sources of lead emissions are anticipated with implementation of the Housing Element Update. Visibility-reducing particles are not explicitly addressed in this analysis because particulate matter is addressed as PM₁₀ and PM_{2.5}. Implementation of the Housing Element Update is not anticipated to result in emissions of vinyl chloride or hydrogen sulfide.³

Toxic Air Contaminants

A toxic air contaminant (TAC) is defined as an air pollutant that may cause or contribute to an increase in mortality or serious illness, or that may pose a hazard to human health. TACs are usually present in minute quantities in the ambient air; however, their high toxicity or health risk may pose a threat to public health even at low concentrations. The California Almanac of Emissions and Air

³ Emission of vinyl chloride and hydrogen sulfides are generally associated with industrial or manufacturing uses. Given the residential uses associated with implementation of the Housing Element Update, these emissions are not anticipated.

Quality—2013 Edition⁴ presents the relevant concentration and cancer risk data for the 10 TACs that pose the most substantial health risk in California based on available data. The 10 TACs are acetaldehyde, benzene, 1,3-butadiene, carbon tetrachloride, hexavalent chromium, para-dichlorobenzene, formaldehyde, methylene chloride, perchloroethylene, and diesel particulate matter (DPM).

Some studies indicate that DPM poses the greatest health risk among the TACs listed above. A 10-year research program⁵ demonstrated that DPM from diesel-fueled engines is a human carcinogen and that chronic (long-term) inhalation exposure to DPM poses a chronic health risk. In addition to increasing the risk of lung cancer, exposure to diesel exhaust can have other health effects. Diesel exhaust can irritate the eyes, nose, throat, and lungs, and it can cause coughs, headaches, lightheadedness, and nausea. Diesel exhaust is a major source of fine particulate pollution as well, and studies have linked elevated particle levels in the air to increased hospital admissions, emergency room visits, asthma attacks, and premature deaths among those suffering from respiratory problems.

DPM differs from other TACs in that it is not a single substance but a complex mixture of hundreds of substances. Although DPM is emitted by diesel-fueled, internal combustion engines, the composition of the emissions varies, depending on the engine type, operating conditions, fuel composition, lubricating oil, and whether an emission control system is present. Unlike the other TACs, however, no ambient monitoring data are available for DPM because no routine measurement method currently exists. The California Air Resources Board (ARB) has made preliminary concentration estimates based on a DPM exposure method. This method uses the ARB emissions inventory’s PM₁₀ database, ambient PM₁₀ monitoring data, and the results from several studies to estimate concentrations of DPM. Table 3.2-2 provides a summary of the types, sources, and effects of TACs.

Table 3.2-2: Description of Toxic Air Contaminants of National and California Concern

Toxic Air Contaminant	Physical Description and Properties	Sources	Most Relevant Effects from Pollutant Exposure
Diesel Particulate Matter (DPM)	DPM is a source of PM _{2.5} —diesel particles are typically 2.5 microns and smaller. Diesel exhaust is a complex mixture of thousands of particles and gases that is produced when an engine burns diesel fuel. Organic compounds account for 80 percent of the total particulate matter mass, which consists of	Diesel exhaust is a major source of ambient particulate matter pollution in urban environments. Typically, the main source of DPM is from combustion of diesel fuel in diesel-powered engines. Such engines are in on-road vehicles such as diesel trucks, off-road construction vehicles, diesel electrical generators, and	Some short-term (acute) effects of DPM exposure include eye, nose, throat, and lung irritation, coughs, headaches, lightheadedness, and nausea. Studies have linked elevated particle levels in the air to increased hospital admissions, emergency room visits, asthma attacks, and premature deaths among those suffering from

⁴ California Air Resource Board (ARB). 2013. California Almanac of Emissions and Air Quality—2013 Edition. Website: <https://ww2.arb.ca.gov/our-work/programs/resource-center/technical-assistance/air-quality-and-emissions-data/almanac>. Accessed July 21, 2022.

⁵ California Air Resource Board (ARB). 2022. Overview: Diesel Exhaust and Health. Website: <https://ww2.arb.ca.gov/resources/overview-diesel-exhaust-and-health>. Accessed July 21, 2022.

Toxic Air Contaminant	Physical Description and Properties	Sources	Most Relevant Effects from Pollutant Exposure
	<p>compounds such as hydrocarbons and their derivatives, and polycyclic aromatic hydrocarbons and their derivatives. Fifteen polycyclic aromatic hydrocarbons are confirmed carcinogens, a number of which are found in diesel exhaust.</p>	<p>various pieces of stationary construction equipment.</p>	<p>respiratory problems. Human studies on the carcinogenicity of DPM demonstrate an increased risk of lung cancer, although the increased risk cannot be clearly attributed to diesel exhaust exposure.</p>
<p>Volatile organic compounds (VOCs)</p>	<p>Reactive organic gases (ROGs), or VOCs, are defined as any compound of carbon—excluding carbon monoxide, carbon dioxide, carbonic acid, metallic carbides or carbonates, and ammonium carbonate—that participates in atmospheric photochemical reactions. Although there are slight differences in the definition of ROGs and VOCs, the two terms are often used interchangeably.</p>	<p>Indoor sources of VOCs include paints, solvents, aerosol sprays, cleansers, tobacco smoke, etc. Outdoor sources of VOCs are from combustion and fuel evaporation. A reduction in VOC emissions reduces certain chemical reactions that contribute to the formulation of ozone. VOCs are transformed into organic aerosols in the atmosphere, which contribute to higher PM₁₀ and lower visibility.</p>	<p>Although health-based standards have not been established for VOCs, health effects can occur from exposures to high concentrations because of interference with oxygen uptake. In general, concentrations of VOCs are suspected to cause eye, nose, and throat irritation; headaches; loss of coordination; nausea; and damage to the liver, the kidneys, and the central nervous system. Many VOCs have been classified as toxic air contaminants (TACs).</p>
<p>Benzene</p>	<p>Benzene is a VOC. It is a clear or colorless light-yellow, volatile, highly flammable liquid with a gasoline-like odor. The EPA has classified benzene as a “Group A” carcinogen.</p>	<p>Benzene is emitted into the air from fuel evaporation, motor vehicle exhaust, tobacco smoke, and from burning oil and coal. Benzene is used as a solvent for paints, inks, oils, waxes, plastic, and rubber. Benzene occurs naturally in gasoline at 1 to 2 percent by volume. The primary route of human exposure is through inhalation.</p>	<p>Short-term (acute) exposure of high doses from inhalation of benzene may cause dizziness, drowsiness, headaches, eye irritation, skin irritation, and respiratory tract irritation, and at higher levels, loss of consciousness can occur. Long-term (chronic) occupational exposure of high doses has caused blood disorders, leukemia, and lymphatic cancer.</p>
<p>Asbestos</p>	<p>Asbestos is the name given to a number of naturally occurring fibrous silicate minerals that have been mined for their useful properties such as thermal insulation, chemical and</p>	<p>Chrysotile, also known as white asbestos, is the most common type of asbestos found in buildings. Chrysotile makes up approximately 90 to 95 percent of all asbestos</p>	<p>Exposure to asbestos is a health threat; exposure to asbestos fibers may result in health issues such as lung cancer, mesothelioma (a rare cancer of the thin membranes lining the lungs,</p>

Toxic Air Contaminant	Physical Description and Properties	Sources	Most Relevant Effects from Pollutant Exposure
	thermal stability, and high tensile strength. The three most common types of asbestos are chrysotile, amosite, and crocidolite.	contained in buildings in the United States.	chest, and abdominal cavity), and asbestosis (a non-cancerous lung disease that causes scarring of the lungs). Exposure to asbestos can occur during demolition or remodeling of buildings that were constructed prior to the 1977 ban on asbestos for use in buildings. Exposure to naturally occurring asbestos can occur during soil-disturbing activities in areas with deposits present.
Hydrogen Sulfide	Hydrogen sulfide (H ₂ S) is a flammable, colorless, poisonous gas that smells like rotten eggs.	Manure, storage tanks, ponds, anaerobic lagoons, and land application sites are the primary sources of hydrogen sulfide. Anthropogenic sources include the combustion of sulfur containing fuels (oil and coal).	High levels of hydrogen sulfide can cause immediate respiratory arrest. It can irritate the eyes and respiratory tract and cause headache, nausea, vomiting, and cough. Long term exposure can cause pulmonary edema.
Sulfates	Sulfates occur in combination with metal and/or hydrogen ions. Many sulfates are soluble in water.	Sulfates are particulates formed through the photochemical oxidation of sulfur dioxide. In California, the main source of sulfur compounds is combustion of gasoline and diesel fuel.	Exposure to sulfates can cause decrease in ventilatory function; aggravation of asthmatic symptoms; aggravation of cardiopulmonary disease; vegetation damage; degradation of visibility; property damage.
Visibility-Reducing Particles	Suspended particulate matter is a mixture of small particles that consist of dry solid fragments, droplets of water, or solid cores with liquid coatings. The particles vary in shape, size, and composition. PM ₁₀ refers to particulate matter that is between 2.5 and 10 microns in diameter (1 micron is one-millionth of a meter). PM _{2.5} refers to particulate matter that is 2.5 microns or less in diameter, about one-thirtieth the size of the average human hair.	Stationary sources include fuel or wood combustion for electrical utilities, residential space heating, and industrial processes; construction and demolition; metals, minerals, and petrochemicals; wood products processing; mills and elevators used in agriculture; erosion from tilled lands; waste disposal; and recycling. Mobile or transportation-related sources are from vehicle exhaust and road dust. Secondary particles form	Short-term exposure (hours/days) can cause: irritation of the eyes, nose, throat; coughing; phlegm; chest tightness; shortness of breath; aggravates existing lung disease, causing asthma attacks and acute bronchitis; those with heart disease can suffer heart attacks and arrhythmias. Long-term exposure may result in: reduced lung function; chronic bronchitis; changes in lung morphology; death.

Toxic Air Contaminant	Physical Description and Properties	Sources	Most Relevant Effects from Pollutant Exposure
		from reactions in the atmosphere.	
Vinyl Chloride	Vinyl chloride, or chloroethene, is a chlorinated hydrocarbon and a colorless gas with a mild, sweet odor. In 1990, the California Air Resources Board (ARB) identified vinyl chloride as a toxic air contaminant (TAC) and estimated a cancer unit risk factor.	Most vinyl chloride is used to make polyvinyl chloride plastic and vinyl products, including pipes, wire and cable coatings, and packaging materials. It can be formed when plastics containing these substances are left to decompose in solid waste landfills. Vinyl chloride has been detected near landfills, sewage plants, and hazardous waste sites.	Short-term exposure to high levels of vinyl chloride in the air causes central nervous system effects, such as dizziness, drowsiness, and headaches. Epidemiological studies of occupationally exposed workers have linked vinyl chloride exposure to development of a rare cancer, liver angiosarcoma, and have suggested a relationship between exposure and lung and brain cancers.
Lead (Pb)	Lead is a solid heavy metal that can exist in air pollution as an aerosol particle component. Leaded gasoline was used in motor vehicles until around 1970. Lead concentrations have not exceeded State or federal standards at any monitoring station since 1982.	Lead ore crushing, lead ore smelting, and battery manufacturing are currently the largest sources of lead in the atmosphere in the United States. Other sources include dust from soils contaminated with lead-based paint, solid waste disposal, and crustal physical weathering.	Lead accumulates in bones, soft tissue, and blood and can affect the kidneys, liver, and nervous system. It can cause impairment of blood formation and nerve conduction, behavior disorders, mental retardation, neurological impairment, learning deficiencies, and low IQs.
<p>Sources:</p> <p>California Air Resources Board (ARB). 2021. Vinyl Chloride and Health. Website: https://ww2.arb.ca.gov/resources/vinyl-chloride-and-health. Accessed July 21, 2022.</p> <p>California Office of Environmental Health Hazard Assessment (OEHHA). 2001. Health Effects of Diesel Exhaust. Website: https://oehha.ca.gov/media/downloads/calenviroscreen/indicators/diesel4-02.pdf. Accessed July 21, 2022.</p> <p>National Archives and Records Administration. 2009. Part II, Environmental Protection Agency. 40 Code of Federal Regulations Parts 50 and 58, Primary National Ambient Air Quality Standard for Nitrogen Dioxide; Proposed Rule. July 15. Website: https://www.gpo.gov/fdsys/pkg/FR-2009-07-15/pdf/E9-15944.pdf. Accessed July 21, 2022.</p> <p>National Toxicology Program. 2016. Report on Carcinogens, 15th Edition; U.S. Department of Health and Human Services, Public Health Service. Benzene. November 3.</p> <p>National Toxicology Program. 2016. Report on Carcinogens, 15th Edition; U.S. Department of Health and Human Services, Public Health Service. Diesel Exhaust Particles. November 3.</p> <p>South Coast Air Quality Management District (SCAQMD). 2007. Final 2007 Air Quality Management Plan. June.</p> <p>United States Environmental Protection Agency (EPA). 2016. Nitrogen Dioxide (NO₂) Pollution. Basic Information about NO₂. Website: https://www.epa.gov/no2-pollution/basic-information-about-no2#What%20is%20NO2. Accessed July 21, 2022.</p>			

Air Quality

Air quality is a function of both the rate and location of pollutant emissions under the influence of meteorological conditions and topographic features. Atmospheric conditions such as wind speed,

wind direction, and air temperature inversions interact with the physical features of the landscape to determine the movement and dispersal of air pollutant emissions and, consequently, their effects on air quality.

Regional Air Quality

Air Quality Standards and Attainment Status of the San Francisco Bay Area Air Basin

Areas that meet National Ambient Air Quality Standard (NAAQS) are classified attainment areas, and areas that do not meet these standards are classified nonattainment areas. Severity classifications range from marginal, moderate, and serious to severe and extreme. The attainment status for the SFBAAB is shown in Table 3.2-3. The SFBAAB is currently designated a nonattainment area for California and National Ozone, California and National PM_{2.5}, and California PM₁₀ NAAQS.

Table 3.2-3: Attainment Status of Criteria Pollutants in the San Francisco Bay Area Air Basin

Pollutant	State Status	National Status
Ozone	Nonattainment	Nonattainment
CO	Attainment	Attainment
NO ₂	Attainment	Attainment
SO ₂	Attainment	N/A
PM ₁₀	Nonattainment	Unclassified
PM _{2.5}	Nonattainment	Nonattainment
Sulfates	Attainment	N/A
Hydrogen Sulfates	Unclassified	N/A
Visibility-reducing Particles	Unclassified	N/A
Lead	N/A	Attainment

Notes: N/A = information not available.
Source: Bay Area Air Quality Management District (BAAQMD). 2017. Air Quality Standards and Attainment Status. January 5. Website: <http://www.baaqmd.gov/research-and-data/air-quality-standards-and-attainment-status>. Accessed August 29, 2022.

Local Air Quality

The local air quality can be evaluated by reviewing relevant air pollution concentrations near the city. The BAAQMD air quality monitoring station closest to the city is located at Owens Court, Pleasanton, which is within the city limits. However, this station only has PM_{2.5} data available. Therefore, data for other pollutants are retrieved from nearby stations outside of Pleasanton. Table 3.2-4 summarizes the recorded ambient air data at the representative monitoring stations for the years 2018 through 2020, which is the most current data available for this analysis. As shown in Table 3.2-4, the air quality has no exceedances of nitrogen dioxide during the most recent 3 years of available data. However, ozone exceeded the State and National standards for a few days in all 3 years. PM₁₀ exceeded the State 50 µg/m³ 24-hour standard for 1 day in 2018 and 1 day in 2020. In addition,

PM_{2.5} exceeded the national 150 µg/m³ 24-hour standard for 13 days in 2018 and 17 days in 2020. It should be noted that most of these exceedances were due to wildfires that create large amounts of particulate matter.

Table 3.2-4 : Air Quality Monitoring Summary

Air Pollutant	Averaging Time	Item	2018	2019	2020
Ozone ¹	1 Hour	Max 1 Hour (ppm)	0.105	0.095	0.113
		Days > State Standard (0.09 ppm)	4	1	3
	8 Hour	Max 8 Hour (ppm)	0.078	0.077	0.086
		Days > National Standard (0.075 ppm)	2	1	2
		Days > National Standard (0.070 ppm) ⁽²⁾	7	2	9
CO	8 Hour	Max 8 Hour (ppm)	ND	ND	ND
		Days > State Standard (9.0 ppm)	ND	ND	ND
		Days > National Standard (9 ppm)	ND	ND	ND
NO ₂ ¹	Annual	Annual Average (ppm)	0.007	0.007	0.006
	1 Hour	Max 1 Hour (ppm)	0.048	0.046	0.037
		Days > State Standard (0.18 ppm)	0	0	0
SO ₂	Annual	Annual Average (ppm)	ND	ND	ND
	24 Hour	Max 24 Hour (ppm)	ND	ND	ND
		Days > State Standard (0.04 ppm)	ND	ND	ND
Inhalable coarse particles (PM ₁₀) ³	Annual	Annual Average State (µg/m ³)	ND	ND	12.1
	24 Hour	Max 24 Hour State (µg/m ³)	36.0	167.0	26.0
		Days > State Standard (50 µg/m ³)	0	1	0
		Days > National Standard (150 µg/m ³)	0	1	0
Fine particulate matter (PM _{2.5}) ⁴	Annual	State Annual Average (µg/m ³)	6.3	11.8	8.4
	24 Hour	24 Hour National (µg/m ³)	29.1	123.8	42.8
		Days > National Standard (35 µg/m ³)	0	17	2
<p>Notes: > = exceed µg/m³ = micrograms per cubic meter max = maximum ND = no data ppm = parts per million Bold = exceedance State Standard = California Ambient Air Quality Standard National Standard = National Ambient Air Quality Standard ¹ Data is retrieved from the station at 793 Rincon Avenue, Livermore, 2.7 miles west of the city limit. ² On October 1, 2015, the EPA strengthened the NAAQS for ground level ozone to 70 parts per million through the adoption of a new standard. The Final Rule went into effect on December 28, 2015.</p>					

Air Pollutant	Averaging Time	Item	2018	2019	2020
<p>³ Data is retrieved from station at 2975 Treat Blvd, Concord, 17 miles north of the city limit as the crow flies. This station is the nearest station to the potential sites for housing that provides this data.</p> <p>⁴ Data is retrieved from station at Owens Ct, Pleasanton, adjacent to the northern city limit.</p> <p>Source: California Air Resources Board (ARB). 2018. iADAM: Top 4 Summary. Website: https://www.arb.ca.gov/adam/topfour/topfour1.php. Accessed August 29, 2022.</p>					

The health impacts of the various air pollutants of concern can be presented in several ways. The clearest comparison is to the State and federal ozone standards. Air concentration below standards indicate that health risks are sufficiently low to have a minimal impact on public health, as there is no such thing as a zero-risk level. When concentrations exceed the standards, impacts will vary based on the amount by which the standard is exceeded. The EPA developed the Air Quality Index (AQI) as an easy-to-understand measure of health impacts compared with concentrations in the air. Table 3.2-5 provides a description of the health impacts of ozone at different concentrations.

Table 3.2-5: Air Quality Index and Health Effects from Ozone

Air Quality Index/ 8-hour Ozone Concentration	Health Effects Description
AQI (1-50)—Good	Sensitive Groups: Children and people with asthma are the groups most at risk.
Concentration 1-54 ppb	Health Effects Statements: None. Cautionary Statements: None.
AQI (51 -100)—Moderate	Sensitive Groups: Children and people with asthma are the groups most at risk.
Concentration 55-70 ppb	Health Effects Statements: Increasing likelihood of respiratory symptoms and breathing discomfort in active children and adults and people with respiratory disease, such as asthma. Cautionary Statements: Active children and adults, and people with respiratory disease, such as asthma, should limit prolonged outdoor exertion.
AQI (101-150)—Unhealthy for Sensitive Groups	Sensitive Groups: Children and people with asthma are the groups most at risk.
Concentration 71-85 ppb	Health Effects Statements: Increasing likelihood of respiratory symptoms and breathing discomfort in active children and adults and people with respiratory disease, such as asthma. Cautionary Statements: Active children and adults, and people with respiratory disease, such as asthma, should limit prolonged outdoor exertion.
AQI (151-200)—Unhealthy	Sensitive Groups: Children and people with asthma are the groups most at risk.

Air Quality Index/ 8-hour Ozone Concentration	Health Effects Description
Concentration 86-105 ppb	<p>Health Effects Statements: Greater likelihood of respiratory symptoms and breathing difficulty in active children and adults and people with respiratory disease, such as asthma; possible respiratory effects in general population.</p> <p>Cautionary Statements: Active children and adults and people with respiratory disease, such as asthma, should avoid prolonged outdoor exertion; everyone else, especially children, should limit prolonged outdoor exertion.</p>
AQI (201-300)—Very Unhealthy	<p>Sensitive Groups: Children and people with asthma are the groups most at risk.</p>
Concentration 106-200 ppb	<p>Health Effects Statements: Increasingly severe symptoms and impaired breathing likely in active children and adults and people with respiratory disease, such as asthma; increasing likelihood of respiratory effects in general population.</p> <p>Cautionary Statements: Active children and adults and people with respiratory disease, such as asthma, should avoid all outdoor exertion; everyone else, especially children, should limit outdoor exertion.</p>
<p>Source: AirNow. AQI Calculator. https://www.airnow.gov/aqi/aqi-calculator/. Accessed August 29, 2022.</p>	

Based on the AQI scale for the 8-hour ozone standard, the Livermore monitoring station, the closest monitoring station to the city with relevant data (please refer to Table 3.2-4), identified at least 1 day in the category of “Unhealthy,” with a maximum reading of 86 parts per billion (ppb) in 2021. Exceedances of the PM10 and PM2.5 24-hour standards were also identified at the nearest monitoring stations to the city.

Air Pollution Sensitive Receptors

The BAAQMD defines sensitive receptors as the following: “facilities or land uses that include members of the population that are particularly sensitive to the effects of air pollutants, such as children, the elderly, and people with illnesses. Examples include schools, hospitals, and residential areas.”⁶ As such, sensitive receptors considered in this analysis include land uses in the city that host members of the population who are particularly sensitive to the effects of air pollution, as described by the BAAQMD.

Development consistent with the Housing Element Update could result in the construction of residential uses across the city on the potential sites for housing. This development would represent the introduction of new sensitive receptors. In addition, various existing sensitive receptor land use types, such as residences, schools, and hospitals, are located throughout the city.

⁶ Bay Area Air Quality Management District (BAAQMD). 2017. Bay Area Air Quality Management District CEQA Air Quality Guidelines.

3.2.2 - Regulatory Framework

Federal

Clean Air Act

Congress established much of the basic structure of the Clean Air Act (CAA) in 1970 and made major revisions in 1977 and 1990. Six common air pollutants (also known as criteria pollutants) are addressed in the CAA. The EPA calls these pollutants criteria air pollutants because it regulates them by developing human health-based and environmentally based criteria (science-based guidelines) for setting permissible levels. The criteria pollutants are:

- Ozone
- Nitrogen dioxide (NO₂)
- Lead
- Particulate matter (PM₁₀ and PM_{2.5})
- Carbon monoxide (CO)
- Sulfur dioxide (SO₂)

Primary federal standards are the levels of air quality necessary, with an adequate margin of safety, to protect the public health. Another set of limits intended to prevent environmental and property damage are called secondary standards.⁷ The federal standards are NAAQS. The air quality standards provide benchmarks for determining whether air quality is healthy at specific locations and whether development activities will cause or contribute to a violation of the standards. The federal standards were set to protect public health, including that of sensitive individuals; thus, the EPA is tasked with updating the standards as more medical research is available regarding the health effects of the criteria pollutants.

EPA Emission Standards for New Off-road Equipment

Before 1994, there were no standards to limit the amount of emissions from off-road equipment. In 1994, the EPA established emission standards for hydrocarbons, NO_x, CO, and PM to regulate new pieces of off-road equipment. These emission standards came to be known as Tier 1. Since that time, increasingly more stringent Tier 2, Tier 3, and Tier 4 (interim and final) standards were adopted by the EPA, as well as by the ARB. Each adopted emission standard was phased in over time. New engines built in and after 2015 across all horsepower sizes must meet Tier 4 final emission standards. In other words, new manufactured engines cannot exceed the emissions established for Tier 4 final emissions standards.⁸

State

California Air Quality Control Plan (State Implementation Plan)

A State Implementation Plan (SIP) is a document prepared by each state describing existing air quality conditions and measures that will be followed to attain and maintain federal standards. The SIP for the State of California is administered by the ARB, which has overall responsibility for Statewide air quality maintenance and air pollution prevention. California's SIP incorporates individual federal attainment plans for regional air districts—an air district prepares their federal

⁷ United States Environmental Protection Agency (EPA). 2021. NAAQS Table. Website: <https://www.epa.gov/criteria-air-pollutants/naaqs-table>. Accessed July 21, 2022.

⁸ United States Environmental Protection Agency (EPA). Regulations for Emissions from Heavy Equipment with Compression-Ignition (Diesel) Engines. Website: <https://www.epa.gov/regulations-emissions-vehicles-and-engines/regulations-emissions-heavy-equipment-compression>. Accessed August 29, 2022.

attainment plan, which is sent to the ARB to be approved and incorporated into the California SIP. Federal attainment plans include the technical foundation for understanding air quality (e.g., emission inventories and air quality monitoring), control measures and strategies, and enforcement mechanisms for attaining and maintaining air quality standards.

Areas designated nonattainment must develop air quality plans and regulations to achieve standards by specified dates, depending on the severity of the exceedances. For much of the country, implementation of federal motor vehicle standards and compliance with federal permitting requirements for industrial sources are adequate to attain air quality standards on schedule. For many areas of California, however, compliance with additional State and local regulation is required to achieve the standards.

California Clean Air Act

The California Legislature enacted the CCAA in 1988 to address air quality issues of concern not adequately addressed by the federal CAA at the time. California's air quality problems were and continue to be some of the most severe in the nation and required additional actions beyond the federal mandates. The ARB administers the California Ambient Air Quality Standards (CAAQS) for the 10 air pollutants designated in the CCAA. The 10 State air pollutants are the six federal standards listed above as well as visibility-reducing particulates, hydrogen sulfide, sulfates, and vinyl chloride. The EPA authorized California to adopt its own regulations for motor vehicles and other sources that are more stringent than similar federal regulations implementing the CAA. Generally, the planning requirements of the CCAA are more stringent than the federal CAA; therefore, consistency with the CAA will also demonstrate consistency with the CCAA.

Other ARB responsibilities include but are not limited to overseeing local air district compliance with California and federal laws; approving local air quality plans; submitting SIPs to the EPA; monitoring air quality; determining and updating area designations and maps; conducting basic research aimed at providing a better understanding between emissions and public well-being, and setting emissions standards for new mobile sources, consumer products, small utility engines, off-road vehicles, and fuels.

California Health and Safety Code Section 39655 and California Code of Regulations Title 17 Section 93000 (Substances Identified as Toxic Air Contaminants)

The ARB identifies substances as TACs as defined in Health and Safety Code Section 39655 and listed in Title 17, Section 93000 of the California Code of Regulations, "Substances Identified As Toxic Air Contaminants." A TAC is defined as an air pollutant that may cause or contribute to an increase in mortality or serious illness, or that may pose a hazard to human health. TACs are usually present in minute quantities in the ambient air; however, their high toxicity or health risk may pose a threat to public health even at low concentrations. In general, for those TACs that may cause cancer, there are thresholds set by regulatory agencies below which adverse health impacts are not expected to occur. This contrasts with the criteria pollutants for which acceptable levels of exposure can be determined and for which the State and federal governments have set ambient air quality standards. According to the California Almanac of Emissions and Air Quality, the majority of the estimated health risk from

TACs for the State of California can be attributed to relatively few compounds, the most important of which is DPM from diesel-fueled engines.

California Low Emission Vehicle Program

The ARB first adopted Low Emission Vehicle (LEV) program standards in 1990. These first LEV standards ran from 1994 through 2003. LEV II regulations, running from 2004 through 2010, represent continuing progress in emission reductions. As the State's passenger vehicle fleet continues to grow and more sport utility vehicles and pickup trucks are used as passenger cars rather than work vehicles, the more stringent LEV II standards were adopted to provide reductions necessary for California to meet federally mandated clean air goals outlined in the 1994 SIP. In 2012, the ARB adopted the LEV III amendments to California's LEV regulations. These amendments, also known as the Advanced Clean Car Program, include more stringent emission standards for model years 2017 through 2025 for both criteria pollutants and greenhouse gas (GHG) emissions for new passenger vehicles.⁹

California On-road Heavy-duty Vehicle Program

The ARB has adopted standards for emissions from various types of new on-road heavy-duty vehicles. Section 1956.8, Title 13, California Code of Regulations contains California's emission standards for on-road heavy-duty engines and vehicles, and test procedures. The ARB has also adopted programs to reduce emissions from in-use heavy-duty vehicles including the Heavy-Duty Diesel Vehicle Idling Reduction Program, the Heavy-Duty Diesel In-Use Compliance Program, the Public Bus Fleet Rule and Engine Standards, and the School Bus Program and others.¹⁰

California In-use Off-road Diesel Vehicle Regulation

On July 26, 2007, the ARB adopted a regulation to reduce DPM and NO_x emissions from in-use (existing) off-road heavy-duty diesel vehicles in California. Such vehicles are used in construction, mining, and industrial operations. The regulation limits idling to no more than 5 consecutive minutes, requires reporting and labeling, and requires disclosure of the regulation upon vehicle sale. The ARB is enforcing that part of the rule with fines up to \$10,000 per day for each vehicle in violation. Performance requirements of the rule are based on a fleet's average NO_x emissions, which can be met by replacing older vehicles with newer, cleaner vehicles or by applying exhaust retrofits. The regulation was amended in 2010 to delay the original timeline of the performance requirements, making the first compliance deadline January 1, 2014, for large fleets (over 5,000 horsepower), 2017 for medium fleets (2,501-5,000 horsepower), and 2019 for small fleets (2,500 horsepower or less).

The latest amendments to the Truck and Bus regulation became effective on December 31, 2014. The amended regulation requires diesel trucks and buses that operate in California to be upgraded to reduce emissions. Newer heavier trucks and buses must meet PM filter requirements beginning

⁹ California Legislative Information. 2002. Clean Car Standards—Pavley, Assembly Bill 1493.

¹⁰ California Air Resources Board (ARB). 2022. On-Road Heavy-Duty Vehicle Programs. <https://ww2.arb.ca.gov/road-heavy-duty-regulations-certification-programs>. Accessed July 21, 2022.

January 1, 2012. Lighter and older heavier trucks must be replaced starting January 1, 2015. By January 1, 2023, nearly all trucks and buses will need to have 2010 model year engines or equivalent.

The regulation applies to nearly all privately and federally owned diesel-fueled trucks and buses and to privately and publicly owned school buses with a gross vehicle weight rating greater than 14,000 pounds. The regulation provides a variety of flexibility options tailored to fleets operating low use vehicles, fleets operating in selected vocations like agricultural and construction, and small fleets of three or fewer trucks.¹¹

California Airborne Toxic Control Measures for Asbestos

The ARB has adopted Airborne Toxic Control Measures (ATCM) for sources that emit a particular TAC. If there is a safe threshold for a substance at which there is no toxic effect, the control measure must reduce exposure below that threshold. If there is no safe threshold, the measure must incorporate Best Available Control Technology to minimize emissions.

In July 2001, the ARB approved an ATCM for construction, grading, quarrying, and surface mining operations to minimize emissions of naturally occurring asbestos. The regulation requires application of Best Management Practices (BMPs) to control fugitive dust in areas known to have naturally occurring asbestos and requires notification to the local air district prior to commencement of ground-disturbing activities. The measure establishes specific testing, notification, and engineering controls prior to grading, quarrying, or surface mining in construction zones where naturally occurring asbestos is located on projects of any size. There are additional notification and engineering controls at work sites larger than one acre in size. These projects require the submittal of a “Dust Mitigation Plan” and approval by the air district prior to the start of a project.

Construction sometimes requires the demolition of existing buildings where construction occurs. Asbestos is also found in a natural state, known as naturally occurring asbestos. Exposure and disturbance of rock and soil that naturally contain asbestos can result in the release of fibers into the air and consequent exposure to the public. Asbestos most commonly occurs in ultramafic rock that has undergone partial or complete alteration to serpentine rock (serpentinite) and often contains chrysotile asbestos. In addition, another form of asbestos, tremolite, can be found associated with ultramafic rock, particularly near faults. Sources of asbestos emissions include unpaved roads or driveways surfaced with ultramafic rock, construction activities in ultramafic rock deposits, or rock quarrying activities where ultramafic rock is present.

The ARB has an ATCM for construction, grading, quarrying, and surface mining operations, requiring the implementation of mitigation measures to minimize emissions of asbestos-laden dust. The measure applies to road construction and maintenance, construction and grading operations, and quarries and surface mines when the activity occurs in an area where naturally occurring asbestos is likely to be found. Areas are subject to the regulation if they are identified on maps published by the Department of Conservation as ultramafic rock units or if the Air Pollution Control Officer or owner/operator has knowledge of the presence of ultramafic rock, serpentine, or naturally occurring

¹¹ California Air Resources Board (ARB). 2022. In-Use Off-Road Diesel-Fueled Fleets Regulation. Website: <https://ww2.arb.ca.gov/our-work/programs/use-road-diesel-fueled-fleets-regulation>. Accessed August 29, 2022.

asbestos on the site. The measure also applies if ultramafic rock, serpentine, or asbestos is discovered during any operation or activity. Review of the Department of Conservation maps indicates that a small vein of ultramafic rock may exist within the city limits.¹²

Verified Diesel Emission Control Strategies

The EPA and the ARB tiered off-road emission standards only apply to new engines and off-road equipment can last several years. The ARB has developed Verified Diesel Emission Control Strategies (VDECS), which are devices, systems, or strategies used to achieve the highest level of pollution control from existing off-road vehicles, to help reduce emissions from existing engines. VDECS are designed primarily for the reduction of DPM emissions and have been verified by ARB. There are three levels of VDECS, the most effective of which is the Level 3 VDECS. Tier 4 engines are not required to install VDECS because they already meet the emissions standards for lower tiered equipment with installed controls.¹³

California Diesel Risk Reduction Plan

The ARB Diesel Risk Reduction Plan has led to the adoption of new State regulatory standards for all new on-road, off-road, and stationary diesel-fueled engines and vehicles to reduce DPM emissions in 2020 by about 90 percent overall from year 2000 levels. The projected emission benefits associated with the full implementation of the ARB Diesel Risk Reduction Plan, including federal measures, are reductions in DPM emissions and associated cancer risks of 75 percent by 2010 and 85 percent by 2020.¹⁴

The ARB Air Quality Land Use Handbook lists the following ARB advisory recommendations that address the issue of siting “sensitive land uses” near specific sources of air pollution:¹⁵

- Chrome plating facilities
- Distribution centers
- Dry cleaners
- High traffic freeways and roads
- Large gas dispensing facilities
- Ports
- Rail yards
- Refineries

The ARB recommended screening distances are shown in Table 3.2-6 below.

Table 3.2-6: Recommendations on Siting New Sensitive Land Uses

Source Category	Advisory Recommendations
Freeways and High Traffic Roads	Avoid siting new sensitive land uses within 500 feet of a freeway, urban roads with 100,000 vehicles/day, or rural roads with 50,000 vehicles/day.

¹² California Department of Conservation, Division of Mine Reclamation. 2000. A General Location Guide for Ultramafic Rocks in California—Areas More likely to Contain Naturally Occurring Asbestos.

¹³ California Air Resources Board (ARB). 2022. Verification Procedure for In-Use Strategies to Control Emissions from Diesel Engines. Website: <https://ww2.arb.ca.gov/our-work/programs/verification-procedure-use-strategies-control-emissions-diesel-engines>. Accessed August 29, 2022.

¹⁴ California Air Resources Board (ARB). 2000. Risk Reduction Plan to Reduce Particulate Matter Emissions from Diesel-fueled Engines and Vehicles. Website: <http://www.arb.ca.gov/diesel/documents/rrpfinal.pdf>. Accessed July 21, 2022.

¹⁵ California Air Resources Board (ARB). 2005. Air Quality and Land Use Handbook. April.

Source Category	Advisory Recommendations
Distribution Centers	Avoid siting new sensitive land uses within 1,000 feet of a distribution center (that accommodates more than 100 trucks per day, more than 40 trucks with operating Transport Refrigeration Units (TRUs) per day, or where TRU unit operations exceed 300 hours per week). Take into account the configuration of existing distribution centers and avoid locating residences and other new sensitive land uses near entry and exit points.
Rail Yards	Avoid siting new sensitive land uses within 1,000 feet of a major service and maintenance rail yard. Within one mile of a rail yard, consider possible siting limitations and mitigation approaches.
Ports	Avoid siting of new sensitive land uses immediately downwind of ports in the most heavily impacted zones. Consult local air districts or the ARB on the status of pending analyses of health risks.
Refineries	Avoid siting new sensitive land uses immediately downwind of petroleum refineries. Consult with local air districts and other local agencies to determine an appropriate separation.
Chrome Platers	Avoid siting new sensitive land uses within 1,000 feet of a chrome plater.
Dry Cleaners Using Perchloroethylene	Avoid siting new sensitive land uses within 300 feet of any dry cleaning operation. For operations with two or more machines, provide 500 feet. For operations with three or more machines, consult with the local air district. Do not site new sensitive land uses in the same building with perchloroethylene dry cleaning operations.
Gasoline Dispensing Facilities	Avoid siting new sensitive land uses within 300 feet of a large gas station (defined as a facility with a throughput of 3.6 million gallons per year or greater). A 50-foot separation is recommended for typical gas dispensing facilities.
Notes: These recommendations are advisory. Land use agencies must balance other considerations, including housing and transportation needs, economic development priorities, and other quality of life issues.	

Tanner Air Toxics Act and Air Toxics Hot Spots Information and Assessment Act

TACs in California are primarily regulated through the Tanner Air Toxics Act (Assembly Bill 1807)¹⁶ and the Air Toxics Hot Spots Information and Assessment Act of 1987 (Assembly Bill 2588),¹⁷ also known as the Hot Spots Act. To date, the ARB has identified more than 21 TACs and has adopted the EPA’s list of Hazardous Air Pollutants (HAPs) as TACs.

¹⁶ California Air Resources Board (ARB). 2022. AB 1807 - Toxics Air Contaminant Identification and Control. Website: <https://ww2.arb.ca.gov/resources/documents/ab-1807-toxics-air-contaminant-identification-and-control>. Accessed August 29, 2022.
¹⁷ California Air Resources Board (ARB). 2022. AB 2588 Air Toxics "Hot Spots." Website: <https://ww2.arb.ca.gov/our-work/programs/ab-2588-air-toxics-hot-spots>. Accessed July 21, 2022.

Carl Moyer Memorial Air Quality Standards Attainment Program

The Carl Moyer Memorial Air Quality Standards Attainment Program (Carl Moyer Program), a partnership between the ARB and local air districts, issues grants to replace or retrofit older engines and equipment with engines and equipment that exceed current regulatory requirements to reduce air pollution. Money collected through the Carl Moyer Program complements California's regulatory program by providing incentives to effect early or extra emission reductions, especially from emission sources in environmental justice communities and areas disproportionately affected by air pollution. The program has established guidelines and criteria for the funding of emissions reduction projects. Within the SFBAAB, the BAAQMD administers the Carl Moyer Program. The Carl Moyer Program has established guidelines and criteria for the funding of emissions reduction projects and has established cost-effectiveness criteria for funding emission reductions projects, which under the final 2017 Carl Moyer Program Guidelines are \$30,000 per weighted ton of NO_x, ROG, and PM.¹⁸

California Refrigerant Management Program

California's Refrigerant Management Program (RMP) regulates refrigerants used in larger facilities, primarily industrial and supermarket land uses. Refrigerants regulated under the RMP include any refrigerant that is an ozone depleting substance as defined in Title 40 of the Code of Federal Regulation, Part 82, and any compound with a global warming potential (GWP) value equal to or greater than 150 according to the GWPs specified in the Intergovernmental Panel on Climate Change's (IPCC) Fourth Assessment Report of 2007. According to the RMP, all supermarket and industrial refrigeration systems with a full recharge capacity of 50 pounds (22.7 kilograms) or greater will be required to limit the refrigerants used to no greater than 150 GWP beginning in 2022. Similarly, according to the RMP, all room air conditioning unit systems with a full recharge capacity of 50 pounds or greater will be required to limit the refrigerants used to no greater than 750 GWP beginning in 2023.¹⁹

Short-lived Climate Pollutants: Organic Waste Reductions (Senate Bill 1383)

Senate Bill (SB) 1383 was signed in September 2016 to reduce emissions of short-lived climate pollutants. SB 1383 establishes targets to achieve a 50 percent reduction in the level of the Statewide disposal of organic waste from the 2014 level by 2020 and a 75 percent reduction by 2025. The law grants California Department of Resources Recycling and Recovery (CalRecycle) the regulatory authority required to achieve the organic waste disposal reduction targets and establishes an additional target that not less than 20 percent of currently disposed edible food is recovered for human consumption by 2025.²⁰ SB 1383 further supports California's efforts to achieve the Statewide 75 percent recycling goal by 2020 established in Assembly Bill (AB) 341. Regional

¹⁸ California Air Resources Board (ARB). 2022. Carl Moyer Program Guidelines. Website: <https://ww2.arb.ca.gov/guidelines-carl-moyer>. Accessed August 29, 2022.

¹⁹ California Air Resources Board (ARB). 2020. Proposed Amendments to CARB's HFC Regulation. December 10. Website: <https://ww3.arb.ca.gov/board/books/2020/121020/20-13-4pres.pdf>. Accessed August 29, 2022.

²⁰ California Department of Resources Recycling and Recovery (CalRecycle). 2022. Short-Lived Climate Pollutants: Organic Waste Methane Emissions Reductions. Website: <https://www.calrecycle.ca.gov/Climate/SLCP/>. Accessed May 2, 2022.

Bay Area Air Quality Management District California Environmental Quality Act Air Quality Guidelines

The BAAQMD is the primary agency responsible for ensuring that air quality standards (NAAQS and CAAQS) are attained and maintained in the SFBAAB through comprehensive planning, regulation, enforcement, technical innovation, and promotion of the understanding of air quality issues. The BAAQMD prepares plans to attain ambient air quality standards in the SFBAAB and prepares ozone attainment plans for the national ozone standard, clean air plans for the California standard, and PM plans to fulfill federal air quality planning requirements. The BAAQMD also inspects stationary sources of air pollution; responds to citizen complaints; monitors ambient air quality and meteorological conditions; and implements programs and regulations required by the CAA and the CCAA.

The BAAQMD developed quantitative thresholds of significance for its California Environmental Quality Act (CEQA) Guidelines in 2010, which were also included in its updated 2011 Guidelines. The BAAQMD's adoption of the 2010 thresholds of significance was later challenged in court. In an opinion issued on December 17, 2015, related to the BAAQMD CEQA Guidelines, the California Supreme Court held that CEQA does not generally require an analysis of the impacts of locating development in areas subject to environmental hazards unless a proposed project would exacerbate existing environmental hazards. The California Supreme Court also found that CEQA requires the analysis of exposing people to environmental hazards in specific circumstances, including the location of development near airports, schools near sources of toxic contamination, and certain exemptions for infill and workforce housing. The California Supreme Court also held that public agencies remain free to voluntarily conduct this analysis not required by CEQA for their own public projects (*CBIA v. BAAQMD*, 2016. 2 Cal.App.5th 1067, 1083).

In view of the California Supreme Court's opinion, the BAAQMD published a new version of its CEQA Guidelines in May 2017. The BAAQMD CEQA Guidelines state that local agencies may rely on thresholds designed to reflect the impact of locating development near areas of toxic air contamination where CEQA requires such an analysis or where the agency has determined that such an analysis would assist in making a decision about a proposed project. However, the thresholds are not mandatory and agencies should apply them only after determining that they reflect an appropriate measure of a project's impacts. The BAAQMD's guidelines for implementing the thresholds are for informational purposes only, to assist local agencies.

Bay Area Air Quality Management District Particulate Matter Plan

To fulfill federal air quality planning requirements, the BAAQMD adopted a PM_{2.5} emissions inventory for the year 2010 at a public hearing on November 7, 2012. The BAAQMD Particulate Matter Plan also included several measures for reducing PM emissions from stationary sources and wood burning. On January 9, 2013, the EPA issued a final rule determining that the Bay Area has attained the 24-hour PM_{2.5} NAAQS, suspending federal SIP planning requirements for the SFBAAB.²¹ Despite this EPA action, the SFBAAB will continue to be designated as nonattainment for the national 24-

²¹ United States Environmental Protection Agency (EPA). 2013. Determination of Attainment for the San Francisco Bay Area Nonattainment Area for the 2006 Fine Particle Standard; California; Determination Regarding Applicability of Clean Air Act Requirements. Website: <https://www.govinfo.gov/content/pkg/FR-2013-01-09/pdf/2013-00170.pdf>. Accessed August 29, 2022.

hour PM_{2.5} standard until the BAAQMD submits a redesignation request and a maintenance plan to the EPA, and the EPA approves the proposed redesignation.

The SFBAAB is designated nonattainment for the State PM₁₀ and PM_{2.5} standards, but the Air Basin is currently unclassified for the federal PM₁₀ standard and nonattainment for federal PM_{2.5} standards. The EPA lowered the 24-hour PM_{2.5} standard from 65 µg/m³ to 35 µg/m³ in 2006 and designated the SFBAAB as nonattainment for the new PM_{2.5} standard effective December 14, 2009.

On December 8, 2011, the ARB submitted a “clean data finding” request to the EPA on behalf of the Bay Area. If the clean data finding request is approved, then EPA guidelines provide that the region can fulfill federal PM_{2.5} SIP requirements by preparing either a redesignation request and a PM_{2.5} maintenance plan, or a “clean data” SIP submittal. Because peak PM_{2.5} levels can vary from year to year based on natural, short-term changes in weather conditions, the BAAQMD believes that it would be premature to submit a redesignation request and PM_{2.5} maintenance plan at this time. Therefore, the BAAQMD will prepare a “clean data” SIP to address the required elements, including:

- An emission inventory for primary PM_{2.5}, as well as precursors to secondary PM formation
- Amendments to the BAAQMD’s New Source Review regulation to address PM_{2.5}

Bay Area Air Quality Management District 2017 Clean Air Plan

In May 2017, the BAAQMD adopted the final Bay Area 2017 Clean Air Plan (2017 Clean Air Plan). The BAAQMD prepared the 2017 Clean Air Plan in cooperation with the Metropolitan Transportation Commission (MTC) and the Association of Bay Area Governments (ABAG). The goals of the 2017 Clean Air Plan are to reduce regional air pollutants and climate pollutants to improve the health of Bay Area residents for the next decades. The 2017 Clean Air Plan aims to lead the region into a post-carbon economy, continue progress toward attaining all State and federal air quality standards, and eliminate health risk disparities from air pollution exposure in Bay Area communities. The 2017 Clean Air Plan includes 85 distinct control measures to help the region reduce air pollutants and has a long-term strategic vision that forecasts what a clean air Bay Area will look like in the year 2050. The 2017 Clean Air Plan envisions a future whereby the year 2050:

- Buildings will be energy efficient—heated, cooled, and powered by renewable energy.
- Transportation will be a combination of electric vehicles, both shared and privately owned; autonomous public transit fleets; with a large share of trips by bicycling, walking, and transit.
- The Bay Area will be powered by clean, renewable electricity and will be a leading incubator and producer of clean energy technologies leading the world in the carbon-efficiency of our products.
- Bay Area residents will have developed a low carbon lifestyle by driving electric vehicles, living in zero-net-energy homes, eating low carbon foods, and purchasing goods and services with low carbon content.
- Waste will be greatly reduced, waste products will be re-used or recycled, and all organic waste will be composted and put to productive use.

The focus of control measures includes aggressively targeting the largest source of GHG, ozone pollutants, and particulate matter emissions: transportation. This includes more incentives for electric vehicle infrastructure, off-road electrification projects such as Caltrain and shore power at ports, and reducing emissions from trucks, school buses, marine vessels, locomotives, and off-road equipment. Additionally, the BAAQMD will continue to work with regional and local governments to reduce vehicle miles traveled through the further funding of rideshare, bike, and shuttle programs.

Bay Area Air Quality Management District Regulations

Regulation 2, Rule 1 (Permits–General Requirements)

The BAAQMD regulates new sources of air pollution and the modification and operation of existing sources through the issuances of authorities to construct and permits to operate. Regulation 2, Rule 1 provides an orderly procedure which projects are required to comply with to receive authorities to construct or permits to operate from the BAAQMD for new sources of air pollutants, as applicable.

Regulation 2, Rule 5 (New Source Review Permitting)

The BAAQMD regulates backup emergency generators, fire pumps, and other sources of TACs through its New Source Review (Regulation 2, Rule 5) permitting process.²² Although emergency generators are intended for use only during periods of power outages, monthly testing of each generator is required; however, the BAAQMD limits testing to no more than 50 hours per year. Each emergency generator installed is assumed to meet a minimum of Tier 2 emission standards (before control measures). As part of the permitting process, the BAAQMD limits the excess cancer risk from any facility to no more than 10 per 1 million population for any permits that are applied for within a 2-year period and would require any source that would result in an excess cancer risk greater than 1 per 1 million to install Best Available Control Technology (BACT) for toxics.

Regulation 6, Rule 1 (Particulate Matter–General Requirements)

The BAAQMD regulates particulate matter emissions through Regulation 6 by means of establishing limitations on emission rates, emissions concentrations, and emission visibility and opacity. Regulation 6, Rule 1 provides existing standards for particulate matter emissions that could result during project construction or operation that a project would be required to comply with, as applicable, such as the prohibition of emissions from any source for a period or aggregate periods of more than three minutes in any hour which are equal to or greater than 20 percent opacity.

Regulation 6, Rule 3 (Wood-burning Devices–2019 Amendment)

The BAAQMD prohibits any person or builder from installing a wood-burning device in new building construction.

Regulation 6, Rule 6 (Particulate Matter–Prohibition of Trackout)

One rule by which the BAAQMD regulates particulate matter includes Regulation 6, Rule 6, which prohibits particulate matter trackout during project construction and operation. Regulation 6, Rule 6 requires the prevention or timely cleanup of trackout of solid materials onto paved public roads

²² Bay Area Air Quality Management District (BAAQMD). 2016. New Source Review Permitting Guidance. Website: <http://www.baaqmd.gov/permits/permitting-manuals/nsr-permitting-guidance>. Accessed August 29, 2022.

outside the boundaries of large bulk material sites, large construction sites, and large disturbed surface sites such as landfills.

Regulation 8, Rule 3 (Architectural Coatings)

This rule governs the manufacture, distribution, and sale of architectural coatings and limits the ROG content in paints and paint solvents. Although this rule would not directly apply to the Housing Element Update, it does dictate the reactive organic gas (ROG) content of paint available for use during the construction.

Regulation 8, Rule 15 (Emulsified and Liquid Asphalts)

Although this rule would not directly apply to the Housing Element Update, it does dictate the reactive organic gases content of asphalt available for use during the construction through regulating the sale and use of asphalt and limits the ROG content in asphalt.

Regulation 9, Rule 8 (Inorganic Gaseous Pollutants–Nitrogen Oxides and Carbon Monoxide from Stationary Internal Combustion Engines)

Under Regulation 9, Rule 8, the BAAQMD regulates the emissions of nitrogen oxides and carbon monoxide from stationary internal combustion engines with an output rated by the manufacturer at more than 50 brake horsepower. As such, any proposed stationary source equipment (e.g., backup generators, fire pumps) which would be greater than 50 horsepower would require a BAAQMD permit under Regulation 9, Rule 8 to operate.

Regulation 11, Rule 2 (Hazardous Pollutants–Asbestos Demolition, Renovation, and Manufacturing)

Under Regulation 11, Rule 2, the BAAQMD regulates emissions of asbestos to the atmosphere during demolition, renovation, milling, and manufacturing and establishes appropriate waste disposal procedures. Any of these activities which pose the potential to generate emissions of airborne asbestos are required to comply with the appropriate provisions of this regulation.

Regulation 1, Rule 301 (Odorous Emissions)

The BAAQMD is responsible for investigating and controlling odor complaints in the Bay Area. The agency enforces odor control by helping the public to document a public nuisance. Upon receipt of a complaint, the BAAQMD sends an investigator to interview the complainant and to locate the odor source if possible. The BAAQMD typically brings a public nuisance court action when there are a substantial number of confirmed odor events within a 24-hour period. An odor source with five or more confirmed complaints per year, averaged over 3 years, is considered to have a substantial effect on receptors.

Several BAAQMD regulations and rules apply to odorous emissions. Regulation 1, Rule 301 is the nuisance provision that states that sources cannot emit air contaminants that cause nuisance to several people. Regulation 7 specifies limits for the discharge of odorous substances where the BAAQMD receives complaints from 10 or more complainants within a 90-day period. Among other things, Regulation 7 precludes discharge of an odorous substance that causes the ambient air at or beyond the property line to be odorous after dilution with four parts of odor-free air and specifies maximum limits on the emission of certain odorous compounds.

Lastly, the BAAQMD enforces the Portable Equipment Registration Program (PERP) ATCM on behalf of the ARB. Under the PERP, owners or operators of portable engines and other types of equipment which meet the qualifications of the ATCM can register their equipment to operate throughout California. However, owners and operators of portable engines which meet the qualifications of this ATCM that do not register their equipment under the PERP must obtain individual permits from local air districts. Permits issued under the PERP must be honored by all air districts throughout California.

Community Air Risk Evaluation Program

The BAAQMD's Community Air Risk Evaluation (CARE) program was initiated in 2004 to evaluate and reduce health risks associated with exposure to outdoor TACs in the Bay Area. Based on findings of the latest report, DPM was found to account for approximately 85 percent of the cancer risk from airborne toxics.

Carcinogenic compounds from gasoline-powered cars and light-duty trucks were also identified as significant contributors: 1,3-butadiene contributed 4 percent of the cancer risk-weighted emissions, and benzene contributed 3 percent. Collectively, five compounds (DPM, 1,3-butadiene, benzene, formaldehyde, and acetaldehyde) were found to be responsible for more than 90 percent of the cancer risk attributed to emissions. All of these compounds are associated with emissions from internal combustion engines. The most important sources of cancer risk-weighted emissions were combustion-related sources of DPM, including on-road mobile sources (31 percent), construction equipment (29 percent), and ships and harbor craft (13 percent). A 75 percent reduction in DPM was predicted between 2005 and 2015 when the inventory accounted for the ARB's diesel regulations. Overall, cancer risk from TAC dropped by more than 50 percent between 2005 and 2015, when emissions inputs accounted for State diesel regulations and other reductions.²³

Modeled cancer risks from TAC in 2005 were highest near sources of DPM: near core urban areas, along major roadways and freeways, and near maritime shipping terminals. Peak modeled risks were found to be located east of San Francisco, near West Oakland and the Maritime Port of Oakland. BAAQMD has identified seven impacted communities in the Bay Area. A large portion of the city is within the "8 Hour Ozone Exceed Zone," as identified by the BAAQMD, where 8-hour ozone levels exceeded the federal standard (75 ppb) three or more times during the summers (2011-2013) used by the BAAQMD analysis to identify impacted communities.

The major contributor to acute and chronic non-cancer health effects in the SFBAAB is acrolein (C₃H₄O). Major sources of acrolein are on-road mobile sources and aircraft near freeways and commercial and military airports.²⁴

Plan Bay Area

Initially adopted in 2013, Plan Bay Area includes integrated land use and transportation strategies for the region and was developed through OneBayArea, a joint initiative between ABAG, BAAQMD,

²³ Bay Area Air Quality Management District (BAAQMD). 2014. Improving Air Quality and Health in Bay Area Communities, Community Air Risk Evaluation Program Retrospective and Path Forward. Website: https://www.baaqmd.gov/~media/Files/Planning%20and%20Research/CARE%20Program/Documents/CARE_Retrospective_April2014.ashx. Accessed August 29, 2022.

²⁴ Bay Area Air Quality Management District (BAAQMD). 2006. Community Air Risk Evaluation Program, Phase I Findings and Policy Recommendations Related to TACs in the San Francisco Bay Area.

MTC, and the San Francisco Bay Conservation and Development Commission. Plan Bay Area's transportation policies focus on maintaining the extensive existing transportation network and utilizing these systems more efficiently to handle density in Bay Area transportation cores.²⁵ Assumptions for land use development come from local and regional planning documents. Emission forecasts in the Bay Area Clean Air Plan rely on projections of Vehicle Miles Traveled (VMT), population, employment, and land use projections made by local jurisdictions during development of Plan Bay Area

The most recent version, Plan Bay Area 2040, was adopted in July 2017.²⁶ Plan Bay Area 2040, published by the MTC and ABAG, is a long-range integrated transportation and land use/housing strategy through 2040 for the Bay Area. Plan Bay Area 2040 functions as the sustainable communities' strategy mandated by SB 375. As a regional land use plan, Plan Bay Area 2040 aims to reduce per capita GHG emissions by promoting more compact, mixed-use residential and commercial neighborhoods located near transit. Plan Bay Area 2040 is a limited and focused update that builds upon a growth pattern and strategies developed in the original Plan Bay Area (adopted by MTC in 2013) but with updated planning assumptions that incorporate key economic, demographic, and financial trends from the previous 4 years. Plan Bay Area 2050 has since been adopted to build upon Plan Bay Area 2040; however, as the 2017 Clean Air Plan predates the adoption of Plan Bay Area 2050, regional growth estimates from Plan Bay Area 2050 have not yet been utilized to underpin the emissions forecasting contained in the BAAQMD's current 2017 Clean Air Plan.

Local

City of Pleasanton General Plan

The Pleasanton General Plan 2005-2025 (General Plan) was adopted in 2009 and was most recently amended in August 2019. The General Plan was developed to guide the long-range development of land and the conservation of resources in the city.²⁷ Goals and policies included in the General Plan that are related to air quality are included below.

Circulation Element

- Goal 4** Provide a multimodal transportation system which creates alternatives to the single-occupancy automobile.
- Policy 13** Phase transit improvements to meet the demand for existing and future development.
- Policy 14** Encourage coordination and integration of Tri-Valley transit to create a seamless transportation system.
- Policy 15** Reduce the total number of average daily traffic trips throughout the City.
- Policy 16** Reduce the percentage of average daily traffic trips taken during peak hours.

²⁵ Association of Bay Area Governments (ABAG). 2017. Plan Bay Area 2040.

²⁶ Ibid.

²⁷ City of Pleasanton. 2009 (last amended in August 2019). Pleasanton General Plan 2005-2025.

- Policy 17** Support the continued and expanded operation of the Livermore Amador Valley Transit Authority.
- Policy 18** Encourage the extension of BART from Pleasanton to Livermore and beyond.
- Policy 19** Support the continued and expanded service of the Altamont Commuter Express.
- Policy 21** Support the use of alternative fuel vehicles.
- Policy 22** Create and maintain a safe, convenient, and effective bicycle system which encourages increased bicycle use.
- Policy 23** Create and maintain a safe and convenient pedestrian system which encourages walking as an alternative to driving.

Public Facilities and Community Programs Element

- Policy 25** As a City organization, develop programs which model best practices in source reduction, waste diversion and use of recycled products.
- Program 25.1** Implement source reduction and waste diversion programs within City government.
- Policy 26** Minimize the City's generation of solid waste materials by supporting the Alameda County Integrated Waste Management Plan and Source Reduction and Recycling Plan and by developing City recycling programs using the California Diversion rate methodology for measurement.
- Program 26.4** Promote incentives for using recycled materials in construction or manufacturing.
- Program 26.6** Promote and provide incentives for using recycled materials in the home or business.

Water Element

- Policy 1** To ensure sustainability, promote the conservation of water resources.
- Program 1.2** Foster water conservation practices which do not allow depletion of groundwater and surface water resources to the extent that they cannot be replaced within the same water season.
- Program 1.7** Require the installation of water conservation devices in new construction and additions.
- Program 1.13** Plant drought-tolerant landscaping in appropriate locations. All landscaping aspects from plant selection to irrigation methods should be designed to reduce water demand, decrease runoff, and minimize impervious surfaces.

Air Quality and Climate Change Element

Goal 1 Implement a proactive approach, and use available technology to maintain and improve air quality within Pleasanton and the region to protect the public health, safety, and welfare.

Goal 2 Promote sustainable development and planning to minimize additional air emissions.

Air Quality Standards

Policy 1 Adhere to federal and State air quality standards for local pollutants of concern.

Program 1.1 Incorporate measures in conditions of approval for development projects to reduce grading, construction, and operations-related air quality impacts.

Program 1.2 Support State and federal legislation that promotes improvements in air quality. Also implement programs from the Hazardous Materials section of the Public Safety Element.

Land Use

Policy 2 Support development plans that reduce mobile source emissions by reducing vehicle trips and vehicle miles traveled.

Implement programs from the Land Use Element to provide mixed-use developments, locate high-density uses near transit facilities, and provide neighborhood-serving retail uses convenient to residential neighborhoods. These programs would reduce vehicle trips and vehicle miles traveled, thus reducing air pollutant emissions.

Policy 3 Separate air pollution sensitive land uses from sources of air pollution.

Program 3.1 Locate new air pollution point sources, such as manufacturing and extracting facilities, away from residential areas and other sensitive land uses following the California Air Resource Board's recommendations.

Program 3 Locate new sensitive receptors, such as residences (including residential care and assisted living facilities for the elderly), childcare centers, schools, playgrounds, and medical facilities away from point sources of air pollution and busy traffic corridors following the California Air Resource Board's recommendations.

Program 3.3 Require site-specific studies of air quality health risk for development that would place sensitive receptors closer than 500 feet from the edge of a freeway or close to a significant point source of air pollution.

Motor Vehicle Travel

Policy 4 Reduce air pollution from motor vehicle trips and vehicle miles traveled.

Program 4.1 Develop standards for the design and use of new drive-through businesses to minimize adverse impacts on air quality. Public education and the use of new technologies should be considered as part of this program. To reduce vehicle miles traveled with commensurate reductions in air pollution and climate change, implement Transportation Demand Management (TDM) programs from the Circulation Element, including the addition of local and regional bicycle lanes. Also implement Circulation Element measures to facilitate the free flow of vehicular traffic, including continually updating computer-control technology for traffic lights. In order to shorten the distance of worker commutes, also implement programs from the Housing Element to provide mixed-use development and to provide housing opportunities for Pleasanton workers of all socioeconomic levels.

Development

Policy 5 Review proposed projects for their potential to impact air quality conditions.

Program 5.1 Include air quality as a factor in the City’s environmental review process. Encourage development plans which minimize negative impacts on air quality.

Program 5.2 Require projects which generate high levels of air pollutants, such as manufacturing facilities and hazardous waste handling operations, to incorporate air quality mitigations in their design.

Program 5.3 Adopt an ordinance regulating burning indoors and outdoors, including fireplaces, wood-burning stoves, and fire pits. The ordinance may consider allowable hours and setbacks from neighbors.

Technology Measures

Policy 7 Provide leadership to Pleasanton residents and businesses by implementing all technology-based air pollutant reduction programs that are reasonable and feasible.

Program 7.4 As the City replaces landscaping equipment, gas cans, street sweepers, and other electrical and mechanical equipment, consider purchasing the least polluting equipment available.

Odors

Policy 8 Minimize unpleasant odors in residential neighborhoods.

Program 8.1 Continue efforts to have the asphalt plant relocated away from Vineyard Avenue residents.

Program 8.2 Continue working with the Dublin-San Ramon Services District (DSRSD) to ensure that odors from the sewage-treatment plant are minimized and other air emissions meet all regulatory requirements.

Public Awareness

Policy 9 Strongly encourage citizen and business participation in reducing air pollution.

- Program 9.1** Provide regional and local air quality information on the City of Pleasanton’s website, including links to the Bay Area Air Quality Management District, the California Air Resources Board, Alameda County Waste Management Authority Stop Waste.org, and other environmental-based internet sites.
- Program 9.3** Develop incentives for the public to help reduce air pollution. This includes offering incentive programs for using non-motorized (i.e., pedestrian and bicycle) and low-polluting mobility alternatives.
- Program 9.5** Provide information to the public regarding the importance of Spare the Air Days and how people can make a positive impact on the environment.

Community Character Element

- Program 9.1** Complete and infill the street tree and median landscaping along streets, when feasible.
- Program 17.5** Consider a City-sponsored street tree replacement program in neighborhoods where street trees have died, been removed, or substantially damaged.
- Program 17.8** Adopt a City street tree ordinance to protect existing and future street trees that are maintained by property owners, and establish planting care, and pruning standards.

Energy Element

- Program 2.1** Sponsor energy-related workshops and invite local builders, architects, homeowners, and business owners.
- Program 2.2** Distribute energy-related educational materials to schools, the library, the media, homeowners, and other organizations
- Policy 4** Reduce heating and cooling energy use in the City.
- Program 4.2** Continue to implement parking lot tree planting standards that would substantially cool parking areas and help cool the surrounding environment. Encourage landscaping conducive to solar panels in areas where appropriate.
- Program 4.3** Reduce heat gain and air conditioning demand by requiring light-colored paving materials for roads, parking areas, and cool roofs in both new and redeveloped areas when feasible and cost effective.

Housing Element

The Housing Element is the primary tool used by the State to ensure local governments are appropriately planning for and accommodating enough housing across all income levels for the planning period 2023-2031. The Housing Element is a mandatory part of a jurisdiction’s General Plan, but it differs from other General Plan elements in two key aspects: (1) it must be updated every 8 years for jurisdictions within a Metropolitan Planning Organization (MPO), such as ABAG; and (2) it must also be reviewed and approved by the California Department of Housing and Community

Development (HCD) to ensure compliance with statutory requirements. Goals, policies, and programs regarding air quality in the Housing Element are provided in Chapter 2, Project Description, specifically, Goal 6, Policies 6.1, 6.4, 6.5, and Programs 6.1, 6.2, 6.3, 6.4, and 6.5 provide guidance for air quality.

Vineyard Avenue Corridor Specific Plan

Site 27 (PUSD-Vineyard) is within the Vineyard Avenue Corridor Specific Plan, which was adopted in 1999. The Vineyard Avenue Corridor Specific Plan is intended to serve as the primary land use and infrastructure regulatory guide for development of the 384-acre Vineyard Avenue Corridor area located along Vineyard Avenue in southeast Pleasanton.²⁸ It includes the following measures to address air quality issues.

Construction Dust Control

Future development within the Specific Plan Area will result in dust and other particulates during site preparation and construction activities. In order to avoid adverse impact on air quality, the following measures shall be implemented:

- During the construction period, all active unpaved construction areas shall be watered at least twice daily or treated with non-toxic soil stabilizers in order to avoid dust. Exposed stockpiles of dirt or sand shall be enclosed, covered, watered twice daily, or treated with non-toxic soil binders.
- If soil material is carried on public or private roads, such roads shall be swept daily with water sweepers to control dust where applicable.
- In graded construction areas, permanent replacement vegetation shall be planted as quickly as possible, properly irrigated, and maintained in healthy growing condition. Graded areas that remain inactive for 10 days or more during the rainy season (October 1 to April 1) without permanent replanting shall be hydroseeded or stabilized.
- All trucks hauling excavated materials shall be covered with tarpaulins or other effective covers.
- All unpaved access roads, parking areas, and staging areas at construction sites shall be rocked, watered three times daily, or covered with non-toxic soil stabilizers.
- Traffic speed on unpaved roads shall be limited to 15 miles per hour.
- ROG emissions from adhesives, cleaning solvents, paint, and asphalt paving materials used during project construction shall be reduced by using materials with a low ROG content, in compliance with BAAQMD standards.

Hacienda Planned Unit Development Plan Design Guidelines

The Hacienda Planned Unit Development (PUD) Plan Design Guidelines do not contain regulations relevant to Air Quality.

²⁸ City of Pleasanton. 1999. Vineyard Avenue Corridor Specific Plan.

City of Pleasanton Climate Action Plan 2.0

The City's Climate Action Plan (CAP 2.0) was built upon the success of the previous plan. It develops a new suite of actions to reduce greenhouse gas emissions, mitigate the acceleration of climate change, and improve community resilience. The CAP 2.0 targets three sectors relevant to utilities: Buildings and Energy, Materials and Consumption, and Water Resources. The CAP 2.0 delineates several goals and frameworks to achieve said goals within these sectors, including maintaining zero-emissions energy through EBCE, SB 1383 implementation, textile recovery, the Water Conservation Program, on-site stormwater management, and more. The CAP 2.0 was adopted in March 2022.²⁹ Relevant strategies that have air quality benefits, in addition to reducing GHG emissions, are provided below:

Transportation and Land Use: Reduce GHG emissions from transportation and land use which will enhance community mobility, improve public health, and result in cost savings.

Strategy TLU-1 The City of Pleasanton will expand existing Zero-Emissions Vehicle (ZEV) fueling infrastructure throughout the community and transition the municipal fleet to EVs. Even with shifts toward active and public transportation, many community members in Pleasanton will still own or lease cars due to proximity and convenience. Acknowledging that car use will continue to persist (and perhaps dominate), this strategy is pivotal to reducing Pleasanton's emissions. By engaging the local community, including school districts and regional organizations, the City of Pleasanton will educate key audiences and identify funding partnerships to support the switch to ZEVs (e.g., electric or hydrogen-fuel celled vehicles). This switch will not only reduce local GHG emissions, but also improve local air quality—especially near major roadways.

Strategy TLU-2 Advance active, shared, and public transportation. Through continued work to support the Valley Link project and implement the City's Trail Master Plan, Bicycle and Pedestrian Master Plan, and Complete Streets program, the City is actively integrating accessible infrastructure that accommodates multiple modes of transportation. The City will continue to expand bicycle infrastructure, encourage transit ridership, and invest in school programs that reduce VMT for curricular and co-curricular activities. The City's investments in active, shared, and public transportation must expand into all areas of the City, and ensure reliable access to alternative transportation options. Convenience, affordability, and ease of use are imperative to the success of alternative transportation programs, as options that are inconvenient and difficult to navigate will likely not be used.

Strategy TLU-3 Advance sustainable land use. Since Pleasanton's population and job base is expected to increase, General Plan Housing Element implementation and LEEDTM ND will be essential to support not only responsible community development, but reduce VMT and provide access to active and/or shared transportation. This strategy will prioritize housing near transit and job centers and encourage sustainable land

²⁹ City of Pleasanton. 2022. Final Climate Action Plan 2.0. March.

development for new projects that get built. Current hurdles to active and public transit include convenience and accessibility linked to land use patterns in Pleasanton. Some of these issues can be solved for future development through conscious efforts to develop with sustainable principles from plan concept to implementation.

City of Pleasanton Municipal Code

9.21. Construction and Demolition Debris.

This chapter generally requires that any activity involving construction, demolition or renovation that requires a building, demolition or similar permit must recycle or reuse 75 percent of construction and demolition debris, and 90% of Portland cement concrete.

9.23 Organics Reduction and Recycling.

As provided in Municipal Code 9.23.010, the purpose of this chapter is to comply with state laws to take measures to reduce the amount of organic and recyclable materials deposited in landfills from commercial and residential generators pursuant to SB 1383. It is also intended to streamline the reduction and recycling process for commercial and residential waste generators by opting into the countywide organics reduction and recycling Ordinance developed by the Alameda County waste management authority (Ordinance 2226 § 2 2021).

3.2.3 - Project Impacts and Mitigation Measures

Significance Criteria

The City is utilizing Appendix G of the State CEQA Guidelines as thresholds of significance for the Housing Element Update. As discussed below, the significance criteria established by the applicable air quality management or air pollution control district may be relied upon to make the following determinations.

Would the Housing Element Update:

- a) Conflict with or obstruct implementation of the applicable air quality plan?
- b) Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is in nonattainment under an applicable federal or State ambient air quality standard?
- c) Expose sensitive receptors to substantial pollutant concentrations?
- d) Result in other emissions (such as those leading to odors) adversely affecting a substantial number of people?

BAAQMD CEQA Air Quality Guidelines

As described in the Regulatory Framework section, the BAAQMD CEQA Air Quality Guidelines contain instructions on how to evaluate, measure, and mitigate air quality impacts generated from

land development construction and operation activities.³⁰ For purposes of this analysis, the City is using the BAAQMD's current criteria pollutant and ozone precursor significance thresholds from their 2017 CEQA Air Quality Guidelines to evaluate the impacts and determine the potential effects of the implementation of the Housing Element Update on air quality.

Clean Air Plan Consistency

Under its plan-level review criteria, which apply to long-range plans such as the Housing Element Update, the BAAQMD requires a consistency evaluation of a plan with its current Air Quality Plan (AQP) control measures. The current AQP is the 2017 Clean Air Plan. The BAAQMD considers a project consistent with the air quality management plan in accordance with the following, which are discussed under Impact AIR-1 below:

- Does the project support the primary goals of the AQP?
- Does the project include applicable control measures from the AQP?
- Does the project disrupt or hinder implementation of any AQP control measures?
- A comparison that the project VMT or vehicle trip increase is less than or equal to the projected population increase.

Criteria Air Pollutants and Ozone Precursors

The BAAQMD has identified thresholds of significance for criteria air pollutant and ozone precursor emissions, including ROG, NO_x, PM₁₀, and PM_{2.5}. These significance thresholds are recommended by the BAAQMD as de minimis thresholds for individual development projects, meaning they represent a level of air pollutant emissions at which impacts to air quality become potentially significant and could contribute to a potential or existing violation of federal and State Ambient Air Quality Standards (AAQS). Development projects below the significance thresholds are not expected to generate sufficient air pollutant emissions to violate any air quality standard or contribute substantially to an existing or projected violation of federal or State AAQS.

According to the BAAQMD's CEQA Air Quality Guidelines, long-range plans (e.g., general plans) present unique challenges for assessing air quality impacts. Because of the SFBAAB's nonattainment status for ozone and PM and the cumulative impacts of population and development growth on air quality, these plans usually have significant and unavoidable adverse air quality impacts. To meet the BAAQMD's recommended plan-level significance thresholds for operational criteria air pollutant and precursor impacts, a proposed plan must satisfy the following criteria:

- Consistency with current AQP control measures.
- Projected VMT or vehicle trips increase is less than or equal to its projected population increase.

³⁰ Bay Area Air Quality Management District (BAAQMD). 2017. CEQA Air Quality Guidelines. Website: https://www.baaqmd.gov/~media/files/planning-and_research/ceqa/ceqa_guidelines_may2017-pdf.pdf?la=en. Accessed August 29, 2022.

Sensitive Receptor Exposure to Pollutant Concentrations

Local Carbon Monoxide Hotspots

Congested intersections have the potential to create elevated concentrations of carbon monoxide (CO), referred to as CO hotspots. The significance criteria for CO hotspots are based on the California AAQS for CO, which are 9.0 ppm (8-hour average) and 20.0 ppm (1-hour average). Under a plan-level review, the BAAQMD does not require an evaluation of CO hotspots.³¹ With the turnover of older vehicles, introduction of cleaner fuels, and implementation of control technology, the SFBAAB is in attainment of the California and National AAQS for CO emissions, and CO concentrations in the Air Basin have steadily declined.

Community Risk and Hazards

The BAAQMD's 2017 CEQA Air Quality Guidelines contain significance thresholds for plan-level analyses with respect to local community health risk and hazards resulting from receptor exposure to TAC emissions. The BAAQMD's significance thresholds for local community risk and hazard impacts apply to both the siting of a new TAC source and to the siting of a new sensitive receptor.

Consistent with BAAQMD guidance, a proposed plan would be considered to have less than significant impacts related to local community health risk and hazard if it contains a land use diagram that identifies special overlay zones around existing and planned sources of TACs and PM_{2.5}, including special overlap zones of at least 500 feet (or another BAAQMD-approved modeled distance) on each side of all freeways and high-volume roadways, and the proposed plan identifies goals, policies, and objectives to minimize potentially adverse impacts. Local community risk and hazard impacts are associated with TACs and PM_{2.5} because emissions of these pollutants can have significant health impacts at the local level.

Odors

The BAAQMD's thresholds for odors are qualitative based on BAAQMD's Regulation 7, Odorous Substances. This rule places general limitations on odorous substances and specific emission limitations on certain odorous compounds. In addition, odors are also regulated under BAAQMD Regulation 1, Rule 1-301, Public Nuisance, which states that no person shall discharge from any source whatsoever such quantities of air contaminants or other material which cause injury, detriment, nuisance, or annoyance to any considerable number of persons or the public; or which endangers the comfort, repose, health, or safety of any such persons or the public, or which causes, or has a natural tendency to cause, injury or damage to business or property. Under BAAQMD's Rule 1-301, a facility that receives three or more violation notices within a 30-day period can be declared a public nuisance. The BAAQMD has established odor screening thresholds for land uses that have the potential to generate substantial odor complaints, including wastewater treatment plants, landfills or transfer stations, composting facilities, confined animal facilities, food manufacturing, and chemical plants. For a plan-level analysis, BAAQMD requires:

- Potential existing and planned location of odors sources to be identified.
- Policies to reduce odors.

³¹ Bay Area Air Quality Management District (BAAQMD). 2017. California Environmental Quality Act Air Quality Guidelines. May.

Approach to Analysis

This air quality analysis was prepared in accordance with the requirements of CEQA to determine whether significant air quality impacts are likely to occur as a result of future development consistent with the Housing Element Update. The BAAQMD's 2017 CEQA Air Quality Guidelines is intended to provide local governments with guidance for analyzing and mitigation project-specific air quality impacts. It provides standards, methodologies, and procedures for conducting air quality analyses consistent with CEQA requirements, which are utilized as appropriate in this Draft Program EIR.

The CalEEMod version 2020.4.0 was used to estimate the Housing Element Update's operation-related air pollutant emissions. The CalEEMod model was developed in cooperation with air districts throughout the State and is designated as a uniform platform for government agencies, land use planners, and environmental professionals to quantify potential criteria pollutant emissions associated with operation from a variety of land uses.

Operational emissions are generated by area, energy, and mobile sources once a project commences operation. While the individual developments envisioned by the Housing Element Update will incrementally become operational each year through 2031, this analysis assesses the operational emissions generated by the full buildout of the Housing Element Update. The major emission sources associated with individual project operation are summarized below.

Mobile Sources

Mobile source emissions refer to exhaust and road dust emissions generated from the motor vehicle traffic that would be facilitated by development consistent with the Housing Element Update. Fehr & Peers prepared a Transportation Assessment for the Housing Element Update,³² which forms the basis for values altered in CalEEMod to estimate project-generated mobile source emissions. These mobile source emissions values can be found in Appendix C.

Area Sources

Area source emissions are generated principally from use of consumer products, cleaning supplies, architectural coatings (paints), landscape equipment, and hearths (fireplaces). Consumer products are various solvents used in non-industrial applications, which emit ROG during their product use. "Consumer Product" means a chemically formulated product used by consumers, including, but not limited, to detergents; cleaning compounds; polishes; floor finishes; cosmetics; personal care products; home, lawn, and garden products; disinfectants; sanitizers; aerosol paints; and automotive specialty products; but does not include other paint products, furniture coatings, or architectural coatings. The default emission factor developed for the CalEEMod model was used. Paints release ROG emissions during application and drying. It is anticipated that buildings as part of development consistent with the Housing Element Update would be periodically repainted as warranted for maintenance needs. ROG emission estimation was based on CalEEMod, and all architectural coating ROG content values were left as CalEEMod defaults. Consistent with BAAQMD Regulation 6, Rule 3, which prohibits any person or builder from installing a wood-burning device in new building construction, no wood-burning hearths are included in the emissions modeling. The CalEEMod

³² Fehr & Peers. 2022. Pleasanton Housing Element – Transportation Assessment.

model estimates emissions generated from the use of landscaping equipment (e.g., leaf blowers, chainsaws, mowers) using the default assumptions in the model.

Energy Sources

Energy source emissions result from on-site natural gas combustion for water and space heating purposes. Natural gas combustion associated with natural gas fueled fireplaces are categorized as area source emissions. Emissions generated from the off-site combustion of fuels for electricity generation are considered indirect emissions and are reported and regulated under different programs associated with that generation facility, such as the ARB's Cap-and-Trade Program or the EPA's Acid Rain Program, Clean Air Interstate Rule, or Cross-State Air Pollution Rule. Indirect emissions resulting from off-site electricity generation are therefore not included in the direct emissions analysis contained herein.

Construction and Operational Toxic Air Contaminants

TACs are air pollutants in minuscule amounts in the air that, if a person is exposed to them, could increase the chances of experiencing health problems. Exposures to TAC emissions can have both chronic long-term (over a year or longer) and acute short-term (over a period of hours) health impacts. Construction-period TAC emissions could contribute to increased health risks to nearby residents or sensitive receptors.

An assessment was made of the potential health impacts to surrounding sensitive receptors resulting from TAC emissions during construction. The TACs of greatest concern are those that cause serious health problems or affect many people. Health problems can include cancer, respiratory irritation, nervous system problems, and birth defects. Some health problems occur soon after a person inhales TACs. These immediate effects may be minor, such as watery eyes; or they may be serious, such as life-threatening lung damage. Other health problems may not appear until many months or years after a person's first exposure to the TAC. Cancer is one example of a delayed health problem.

Fine particle pollution or PM_{2.5} describes particulate matter that is 2.5 micrometers in diameter and smaller—one-thirtieth the diameter of a human hair. Fine particle pollution can be emitted directly or formed secondarily in the atmosphere. PM_{2.5} health impacts are important because their size can be deposited deeply in the lungs causing respiratory effects.

For the purposes of this analysis, exhaust emissions of DPM, are represented as exhaust emissions of PM_{2.5}. Studies indicate that DPM poses the greatest health risk among airborne TACs. A 10-year research program conducted by the ARB demonstrated that DPM from diesel-fueled engines is a human carcinogen and that chronic (long-term) inhalation exposure to DPM poses a chronic long-term health risk. DPM differs from other TACs in that it is not a single substance but a complex mixture of hundreds of substances. Although DPM is emitted by diesel-fueled internal combustion engines, the composition of the emissions varies depending on engine type, operating conditions, fuel composition, lubricating oil, and whether an emission control system is present.

Odors

During project construction and operation, various activities, such as equipment and vehicle use and the application of asphalt and architectural coatings, would generate odors. CalEEMod does not quantify the anticipated odor emissions generated by project construction; however, odor sources that would be introduced by development consistent with the Housing Element Update are analyzed below under Impact AIR-4 and qualitatively assessed. In addition, odor sources that may exist near new residences facilitated by the Housing Element Update are identified and analyzed under Impact AIR-4.

Impact Evaluation

Consistency with Air Quality Management Plan

Impact AIR-1: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments could conflict with or obstruct implementation of the applicable air quality plan.

The current AQP applicable to the Housing Element Update is the 2017 Clean Air Plan. According to the BAAQMD's guidance, a proposed land use plan is consistent with the AQP if it would (1) support the primary goals of the AQP, (2) include applicable control measures from the AQP, (3) not disrupt or hinder implementation of any AQP control measures, and (4) the plan's projected VMT increase must be less than or equal to its projected population growth.

The Housing Element Update Supports the Primary Goals of the AQP

The primary goals of the 2017 Clean Air Plan are to (1) attain air quality standards, (2) reduce population exposure and protect public health, and (3) reduce GHG emissions and protect the climate. The Housing Element Update is evaluated in comparison with these goals below.

Attain Air Quality Standards

BAAQMD's 2017 Clean Air Plan strategy is based on regional population and employment projections within the Bay Area compiled by ABAG.³³ Demographic trends incorporated into Plan Bay Area 2040 determine VMT within the Bay Area, which BAAQMD utilizes to forecast future air quality trends. The SFBAAB is currently designated a nonattainment area for O₃, PM_{2.5}, and PM₁₀ (State AAQS only).

The Housing Element Update would accommodate new residential uses through the horizon year 2031. Long-term criteria pollutant emissions would result from the operation of potential residential uses facilitated by the Housing Element Update. Operational air quality emissions are principally generated from area sources, energy sources, and mobile sources. Area source emissions are the combination of many small emission sources that include use of outdoor landscape maintenance equipment, use of consumer products such as cleaning products, and periodic reapplication of architectural coatings. Energy source emissions result principally from the on-site use of natural gas; electricity consumption is not included in energy source emissions as those potential emissions would be generated as the result of the operation of an electricity generation facility which may or may not be within the same air basin and under the same attainment status as the end-use. Mobile

³³ Bay Area Air Quality Management District (BAAQMD). 2017. Final 2017 Clean Air Plan. April.

source emissions result from vehicle activity associated with the operation of a given land use development project, including resident, worker, and visitor vehicle trips.

The BAAQMD recommends the method for determining whether a project or plan supports the goals of the AQP is to determine whether that project or plan is consistent with a BAAQMD-approved CEQA threshold of significance. As discussed under Impact AIR-2, the BAAQMD determines a plan, such as the Housing Element Update, to result in an exceedance of recommended significance thresholds if a plan facilitates growth in VMT that exceeds the growth in population over that same time. As discussed below and under Impact AIR-2, the Housing Element Update would result in population growth which outpaces forecasted VMT growth, and thus the Housing Element Update would not result in an exceedance under this criterion.

In measuring whether an individual development project would have potentially significant impacts on local and regional air quality, including consideration of an individual development project's contribution to an existing or forecasted air quality violation, the BAAQMD recommends project-level significance thresholds for criteria pollutants and ozone precursors. Considering the BAAQMD's recommended significance thresholds and that the SFBAAB is currently in nonattainment for PM standards, individual development projects facilitated by the Housing Element Update would be considered to have potentially significant site-specific or project-specific impacts related to the generation of fugitive dust during construction activities if they do not implement BMP targeting dust control and sediment migration. Therefore, Mitigation Measure (MM) AIR-1a, which would require individual development projects to employ dust control measures recommended by the BAAQMD during construction, would ensure that all future development projects facilitated by the Housing Element Update would not result in potentially significant impacts related to construction fugitive dust and contribute to the region's current nonattainment status for PM.

Reduce Population Exposure and Protect Public Health from Toxic Air Contaminants

Development facilitated by the Housing Element Update would result in an increase in new residential uses throughout the city. As identified in the discussion of community risk and hazards (see Impact AIR-3 below), new sensitive land uses could be proximate to sources of TACs. However, as discussed in Impact AIR-3, compliance with BAAQMD regulations and mitigation measures would ensure that new sources of TACs do not expose populations to significant health risk. Consistent with BAAQMD's CEQA Air Quality Guidelines, the implementation of the Housing Element Update would not result in a potentially significant community risk and hazard impact if the associated land use diagram identifies special overlay zones around existing and planned sources of TACs, including special overlay zones of at least 500 feet on each side of all freeways and high-volume roadways, and the plan identifies goals, policies, and objectives to minimize potentially adverse impacts.

Once adopted, the General Plan would be amended to include the Housing Element Update. Policy 3 in Chapter 9, Air Quality and Climate Change Element, of the General Plan requires that sensitive land uses shall be separated from sources of air pollution. Program 3.2 states that new sensitive receptors, such as residences (including residential care and assisted living facilities for the elderly), childcare centers, schools, playgrounds, and medical facilities shall be located away from point sources of air pollution and busy traffic corridors following the ARB's recommendations. Program 3.3 requires site-specific studies to analyze the air quality health risk for development that would place

sensitive receptors closer than 500 feet from the edge of a freeway or close to a significant point source of air pollution. As such, individual development projects facilitated by the Housing Element Update that would introduce new sensitive receptors within 500 feet of a freeway or a significant point source of air pollution would be required to conduct a site-specific analysis of the potential health risk as part of the measures required for the project (see MM AIRI 1b, below). To support this requirement, the General Plan establishes a special overlay zone covering areas within 500 feet from the edge of a freeway or high-volume roadways within which future individual development projects facilitated by the Housing Element Update would need to prepare a site-specific analysis to inform site planning and design, as well as identify and mitigate potentially significant health impacts. For project sites that would be located within siting distances recommended by the BAAQMD and ARB, currently published in the ARB Air Quality and Land Use Handbook: A Community Health Perspective, or the latest available guidance as determined by the City of Pleasanton as the lead agency, MM AIR-1b would be required. For these project sites, MM AIR-1b requires that a site-specific Health Risk Assessment (HRA) be conducted and mitigation be developed to reduce any identified significant health risk to sensitive receptors to less than significant levels. The Housing Element Update and associated City actions and would not result in the preclusion, removal, or conflict with existing General Plan policies establishing this zone for further analysis, therefore the Housing Element Update would be considered consistent with this AQP goal.

Reduce Greenhouse Gas Emissions

GHG emissions are discussed in greater detail in Section 3.7, Greenhouse Gas Emissions. As discussed therein, implementation of the Housing Element Update would substantially contribute to the region's achievement of the 2030 Statewide GHG reduction goal by targeting a 70 percent reduction in per capita emissions by 2030 and is forecasted to advance toward the 2045 Statewide goal of carbon neutrality. Consequently, the Housing Element Update is consistent with the goals of the 2017 Clean Air Plan to reduce GHG emissions.

The Housing Element Update Includes Applicable Control Measures From the Air Quality Plan

The BAAQMD's 2017 Clean Air Plan contains 55 control measures aimed at reducing air pollution in the Bay Area. These include control measures addressing stationary, area, mobile source, and transportation emissions. They also include control measures designed to protect the climate and promote mixed use, compact development to reduce vehicle emissions and exposure to pollutants from stationary and mobile sources. BAAQMD encourages lead agencies to incorporate these measures into plan elements. As explained below, the Housing Element Update includes the applicable control measures from the AQP.

Table 3.2-7 identifies the applicable control measures included in the 2017 Clean Air Plan and the General Plan policies and regulations in the Pleasanton Municipal Code (Municipal Code) related to the control measures.

Table 3.2-7: Housing Element Update Consistency with 2017 Clean Air Plan

2017 Clean Air Plan Control Measure	Consistent with Control Measure?	Discussion
<p>TR2 (Trip Reduction Programs): Encourage trip reduction policies and programs in local plans, e.g., general and specific plans, while providing grants to support trip reduction efforts. Encourage local governments to require mitigation of vehicle travel as part of new development approval, to adopt transit benefits ordinances in order to reduce transit costs to employees, and to develop innovative ways to encourage rideshare, transit, cycling, and walking for work trips.</p>	<p>Yes</p>	<p>The General Plan, Circulation Element, includes the following policies related to bicycle and pedestrian facilities which support this control measure:</p> <p>Policy 22: Create and maintain a safe, convenient, and effective bicycle system which encourages increased bicycle use.</p> <p>Policy 23: Create and maintain a safe and convenient pedestrian system which encourages walking as an alternative to driving.</p> <p>The Housing Element Update includes the following policies to support the reduction of trips and VMT.</p> <p>Policy 1.2: Maintain the amount of high-density residential acreage currently designated on the General Plan Land Use Map that permits high-density housing and maintain land use designations for sites rezoned to accommodate the 6th Cycle RHNA.</p> <p>Policy 1.3: Encourage residential and mixed-use projects to be designed at the maximum building height permitted consistent with standards to be adopted in the Objective Design Standards as referenced in Program 6.1 (in the Housing Element Update). However, in the downtown, multi-family residential building height should be consistent with the requirements of the Downtown Specific Plan and the Downtown Design Guidelines.</p> <p>Program 1.3: Adopt zoning standards consistent with the Bay Area Rapid Transit (BART) Transit Oriented Development (TOD) Place Type. Neighborhood/Town Center for Assembly Bill (AB) 2923-eligible parcels within a half-mile of the West Dublin/Pleasanton and Dublin/Pleasanton BART stations. This includes requiring a minimum of 75 dwelling units per acre and five stories.</p> <p>Policy 6.5: Encourage new housing to be located in areas well-served by public transit and the active transportation network (e.g., pedestrian and bicycle facilities), and seek to improve these facilities throughout the City, in order to improve access to all modes of transportation and reduce Vehicle Miles Traveled (VMT) associated with new development. To encourage the development of housing at the Dublin/Pleasanton BART parking lot parcels, the City will take the following steps:</p>

2017 Clean Air Plan Control Measure	Consistent with Control Measure?	Discussion
		<ul style="list-style-type: none"> • Develop and adopt Objective Design Standards for the Dublin/Pleasanton BART parking lot parcels that reflect the allowable minimum development standards set forth in AB 2923. • Undertake preparation of a concept plan for the Dublin/Pleasanton BART parking lot parcels, with input from BART and the community, that addresses the range of allowable land uses, including housing at the assigned density. The City will lead the planning effort and seek grant and other funding to support this effort. • Ensure that the plan adequately addresses parking for new uses and existing commuter parking needs, with the goal to provide an appropriate amount of replacement parking and implement strategies to reduce and manage overall parking demand. Funding for replacement parking, including potential non-BART sources of funding, will be addressed in coordination with the City and BART. • During and upon adoption of the plan, the City will work with BART to actively pursue development interest in the parcels, including soliciting developer input on the plan during plan preparation, and issuance of Request(s) for Proposals to pursue development of the site during the 6th Cycle Housing Element planning period. <p>The CAP 2.0 also includes actions that result in trip reduction, such as E4 Regional Transit Support; P10 Increase Transit Ridership; S4 VMT Reduction for K-12 Activities; E6 Housing Element; P11 Promote LEED™ Neighborhood Development. For detailed policies, please refer to CAP 2.0.³⁴</p>
<p>TR9 (Bicycle and Pedestrian Access Facilities): Encourage planning for bicycle and pedestrian facilities in local plans, e.g., general and specific plans, fund bike lanes, routes, paths and bicycle parking facilities.</p>	<p>Yes</p>	<p>The General Plan, Circulation Element, includes the following policies related to bicycle and pedestrian facilities which support this control measure:</p> <p>Policy 22: Create and maintain a safe, convenient, and effective bicycle system which encourages increased bicycle use.</p> <p>Policy 23: Create and maintain a safe and convenient pedestrian system which encourages walking as an alternative to driving.</p>

³⁴ City of Pleasanton. 2022. Climate Action Plan 2.0. Website: <http://www.cityofpleasantonca.gov/depts/os/env/cap/resources.asp>. Accessed October 3, 2022.

2017 Clean Air Plan Control Measure	Consistent with Control Measure?	Discussion
		<p>In addition to Policy 6.5, listed above, the Housing Element Update includes the following program to improve bicycle and pedestrian facilities:</p> <p>Program 6.4: Work to enhance multimodal transportation throughout Pleasanton by:</p> <ul style="list-style-type: none"> • Implementing the network of bicycle and pedestrian facilities envisioned in the Bicycle and Pedestrian Master Plan to enhance the citywide network of bikeways, walkways, and trails that are accessible, safe, comfortable, and convenient for people of all ages and abilities and to maximize multimodal transportation options by improving access to BART, ACE, and bus lines. The City will accomplish this by dedicating local and regional transportation funds as available to advance high priority bicycle and pedestrian improvement projects, pursuing grant opportunities to augment local these funds whenever feasible, and by requiring developers to implement multimodal improvements as part of projects. • Actively participating as a member agency of LAVTA and ValleyLink and through State and regional advocacy efforts to secure improved transit service to and throughout Pleasanton, including more frequent and convenient bus and rail service. <p>The CAP 2.0 also includes actions that support this control measure such as E3 Bicycle and Pedestrian Master Plan and Trails Master Plan; E5 Complete Streets implementation; P8 Bicycle amenities; P9 Bicycle rack incentive program. For detailed policies, please refer to CAP 2.0</p>
<p>EN2 (Decrease Electricity Demand): Work with local governments to adopt additional energy efficiency policies and programs. Support local government energy efficiency program via best practices, model ordinances, and technical support. Work with partners to develop messaging to decrease electricity demand during peak times.</p>	<p>Yes</p>	<p>The General Plan, Energy Element, includes the following policies related to improving energy efficiency which support this control measure:</p> <p>Program 2.1: Sponsor energy-related workshops and invite local builders, architects, homeowners, and business owners.</p> <p>Program 2.2: Distribute energy-related educational materials to schools, the library, the media, homeowners, and other organizations</p> <p>The Housing Element Update includes several policies and programs to reduce electricity demand in the City, as follows:</p> <p>Program 6.2: Implement the Climate Action Plan’s (CAP 2.0) applicable actions related to new</p>

2017 Clean Air Plan Control Measure	Consistent with Control Measure?	Discussion
		<p>residential construction, improving residential water and energy efficiency, and reducing VMTs associated with new units including the following: P1–All Electric Reach Code, P2–Existing Building Electrification Plan, P4–Solar and Storage on New Construction, P5–Zero Emissions Infrastructure, P8–Improve Bicycle Amenities, P9–Bicycle Rack Incentive Program, P10–Increase Transit Ridership, P11–Promote LEED™ Neighborhood Development, P15–Water Efficiency Retrofits, S1–Refrigerant Management, S2–Energy Efficiency Upgrades, and S6–Embodied Carbon Reduction Plan.</p> <p>Program 6.3: Seek out and utilize available energy efficiency upgrade program funding for low-interest loans to support alternative energy usage and/or significant water conservation systems in exchange for securing new and/or existing rental housing units affordable to very low- and low-income households.</p> <p>Program 6.5: Implement the applicable housing related air quality, climate change, green building, water conservation, energy conservation, and community character programs of the Pleasanton General Plan, including:</p> <ul style="list-style-type: none"> • Programs 1.5, 1.7, 1.8, 1.12, 1.13, 1.14, and 3.12 of the Water Element. • Program 9.1 of the Community Character Element. • Policies 2, 3, 4, 6 and 7 and programs 2.1-2.7, 3.1-3.5, 4.1-4.3, 6.1-6.4, 7.1-7.3, and 7.6 of the Energy Element. <p>The CAP 2.0 also includes actions S2 Community Energy Efficiency Upgrades and S3 Energy Benchmarking and City Facility Retrofits that support this control measure. For detailed policies, please refer to CAP 2.0.</p>
<p>BL4 (Urban Heat Island Mitigation): Develop and urge adoption of a model ordinance for “cool parking” that promotes the use of cool surface treatments for new parking facilities, as well existing surface lots undergoing resurfacing. Develop and promote adoption of model building code requirements for new construction or re-roofing/roofing upgrades for commercial and residential multi-family housing. Collaborate with expert partners to</p>	<p>Yes</p>	<p>The General Plan, Energy Element, includes the following policies related to reducing the urban heat island effect which support this control measure:</p> <p>Policy 4: Reduce heating and cooling energy use in the City.</p> <p>Program 4.2: Continue to implement parking lot tree planting standards that would substantially cool parking areas and help cool the surrounding environment. Encourage landscaping conducive to solar panels in areas where appropriate.</p> <p>Program 4.3: Reduce heat gain and air conditioning demand by requiring light-colored paving materials</p>

2017 Clean Air Plan Control Measure	Consistent with Control Measure?	Discussion
<p>perform outreach to cities and counties to make them aware of cool roofing and cool paving techniques, and of new tools available.</p>		<p>for roads, parking areas, and cool roofs in both new and redeveloped areas when feasible and cost effective.</p> <p>The Housing Element Update will support this measure through policies and programs that promote sustainable building design, improve streetscapes, and that seek to reduce heating and cooling energy use in the City, as previously listed (including Programs 6.2, 6.3 and 6.5).</p>
<p>NW2 (Urban Tree Planting): Develop or identify an existing model municipal tree planting ordinance and encourage local governments to adopt such an ordinance. Include tree planting recommendations, the Air District’s technical guidance, best practices for local plans, and CEQA review.</p>	<p>Yes</p>	<p>The General Plan, Air Quality and Climate Change Element, includes the following policies related to urban tree planting which support this control measure:</p> <p>Program 9.1: Complete and infill the street tree and median landscaping along streets, when feasible.</p> <p>Program 17.5: Consider a City-sponsored street tree replacement program in neighborhoods where street trees have died, been removed, or substantially damaged.</p> <p>Program 17.8: Adopt a City street tree ordinance to protect existing and future street trees that are maintained by property owners, and establish planting care, and pruning standards.</p> <p>Furthermore, the City has adopted the following ordinance, which applies to the Housing Element Update:</p> <p>Municipal Code 19.36.100 Street trees: Street trees, in an amount determined by the City Engineer, shall be provided by the subdivider in all subdivisions on both sides of the street, either within the street right-of-way or within a dedicated public service easement, not less than eight feet wide adjacent to the street. Street trees shall be selected, installed and maintained in accordance with City ordinances or regulations.</p> <p>The CAP 2.0 also includes action P13 Urban Forest Master Plan that supports this control measure by outlining the tree planting plans and policies for the City. For detailed policies, please refer to CAP 2.0.</p>
<p>WA3 (Green Waste Diversion): Develop model policies to facilitate local adoption of ordinances and programs to reduce the amount of green waste going to landfills.</p>	<p>Yes</p>	<p>The General Plan, Public Facilities and Community Programs Element, includes the following policies and programs related to green waste diversion which support this control measure:</p>

2017 Clean Air Plan Control Measure	Consistent with Control Measure?	Discussion
		<p>Program 25.1: Implement source reduction and waste diversion programs within City government.</p> <p>Program 26.7: Consider requiring businesses and multi-family residents to participate in recycling and waste reduction programs.</p> <p>Program 26.10: Continue to support the green waste composting program. [This is codified in the Municipal Code in Chapter 9.23.]</p> <p>Program 26.11: Continue to support the food-scrap composting program, if it is cost effective. [This is codified in the Municipal Code in Chapter 9.23.]</p> <p>Program 26.18: Residential projects with more than three units and all nonresidential projects in the City shall prepare and implement a Project Waste Diversion Plan that includes a discussion of the project’s diversion strategies. The plan shall include a description of on-site disposal, composting and recycling facilities, a construction debris disposal and recycling plan, and a discussion of any pre-waste stream conservation measures appropriate to the project. The City shall review and approve waste diversion plans as part of the land entitlement process for projects.</p> <p>The CAP 2.0 also includes actions E7 SB 1383 Implementation and E8 Outreach and Education that support this control measure. For detailed policies, please refer to CAP 2.0.</p>
<p>WA4 (Recycling and Waste Reduction): Develop or identify and promote model ordinances on community-wide zero-waste goals and recycling of construction and demolition materials in commercial and public construction projects.</p>	<p>Yes</p>	<p>The General Plan, Public Facilities and Community Program Element, includes the following policies related to recycling and waste reduction which support this control measure:</p> <p>Policy 25: As a City organization, develop programs which model best practices in source reduction, waste diversion and use of recycled products.</p> <p>Program 25.1: Implement source reduction and waste diversion programs within City government.</p> <p>Policy 25: As a City organization, develop programs which model best practices in source reduction, waste diversion and use of recycled products.</p> <p>Program 26.1: Continue to promote the recycling of materials at the solid waste transfer station and other locations.</p>

2017 Clean Air Plan Control Measure	Consistent with Control Measure?	Discussion
		<p>Program 26.2: Recycle paper, glass, metal, and other marketable materials through the City’s centralized recycling program.</p> <p>Program 26.3: Continue to develop a curbside recycling program and evaluate current practices to determine whether separate collection bins would increase diversion rates.</p> <p>Program 26.4: Promote incentives for using recycled materials in construction or manufacturing.</p> <p>Program 26.5: Adopt a construction and demolition debris recycling ordinance. [A construction and demolition recycling ordinance was adopted by the City in 2009 and is included in the Municipal code as Chapter 9.21.]</p> <p>Program 26.6: Promote and provide incentives for using recycled materials in the home or business.</p> <p>Program 26.7: Consider requiring businesses and multi-family residents to participate in recycling and waste reduction programs</p> <p>Program 26.8: Promote and provide incentives for the reduction of curbside waste.</p> <p>Program 26.9: Utilize waste management reclamation methods to the fullest extent feasible.</p> <p>Program 26.10: Continue to support the green waste composting program. [This is mandatory per SB 1383 and is codified in the Municipal Code in Chapter 9.23.]</p> <p>Program 26.11: Continue to support the food-scrap composting program, if it is cost effective.[This is mandatory per SB 1383 and is codified in the Municipal Code in Chapter 9.23.]</p> <p>Program 26.13: Provide accessible disposal containers, including recycling containers, at appropriate locations downtown, at outdoor events, and in City parks.</p> <p>Program 26.18: Residential projects with more than three units and all nonresidential projects in the City shall prepare and implement a Project Waste Diversion Plan that includes a discussion of the project’s diversion strategies. The plan shall include a description of on-site disposal, composting and recycling facilities, a construction debris disposal and recycling plan, and a discussion of any pre-waste stream conservation measures appropriate to the</p>

2017 Clean Air Plan Control Measure	Consistent with Control Measure?	Discussion
		project. The City shall review and approve waste diversion plans as part of the land entitlement process for projects.
<p>WR2 (Support Water Conservation): Develop a list of best practices that reduce water consumption and increase on-site water recycling in new and existing buildings; incorporate into local planning guidance.</p>	Yes	<p>The General Plan, Water Element, includes the following policies related to water conservation which support this control measure:</p> <p>Policy 1: To ensure sustainability, promote the conservation of water resources.</p> <p>Program 1.2: Foster water conservation practices which do not allow depletion of groundwater and surface water resources to the extent that they cannot be replaced within the same water season.</p> <p>Program 1.5: Utilize cost effective water reclamation and recycling techniques for the purpose of water conservation rather than as a new source of water which must be used to sustain new and existing development, where these techniques can be implemented without degrading surface water and groundwater quality.</p> <p>Program 1.7: Require the installation of water conservation devices in new construction and additions.</p> <p>Program 1.10: During construction or reconstruction of public facilities, institute water conservation measures such as hot-on-demand water faucets, low-flush toilets, low water-using appliances, and low water-using irrigation devices and/or water-conserving landscaping.</p> <p>Program 1.11: Retrofit existing public facilities, as feasible, to institute water conservation measures.</p> <p>Program 1.13: Plant drought-tolerant landscaping in appropriate locations. All landscaping aspects from plant selection to irrigation methods should be designed to reduce water demand, decrease runoff, and minimize impervious surfaces.</p> <p>Program 1.14: Undertake programs to educate citizens about water conservation in the home and in landscaping.</p> <p>The Housing Element Update supports water conservation through the following goals and policies:</p> <p>Program 4.4: Continue to assess and plan for adequate water supply and infrastructure, including completion of groundwater treatment improvements</p>

2017 Clean Air Plan Control Measure	Consistent with Control Measure?	Discussion
		<p>to address known contaminants in City-operated wells; completion of water supply and operational plan updates, undertaking required updates to the City’s Urban Water Management Plan; working with water suppliers including Zone 7 to ensure adequate supplies; and implementation of the City’s recycled water and water conservation programs.</p> <p>Programs 6.3 and 6.5, as previously listed.</p> <p>The CAP 2.0 also includes actions that support this control measure such as E14 Water Controller Assistant Program; E15 Smart Water Meter Installation; E16 Water Conservation Program; P15 Water Efficiency and Retrofits; E17 On-site Stormwater Management; S8 Green Stormwater Infrastructure Plan. For detailed policies, please refer to CAP 2.0</p>
<p>Sources: Bay Area Air Quality Management District (BAAQMD). 2017. Final 2017 Clean Air Plan. City of Pleasanton. 2022. Climate Action Plan 2.0. Website: http://www.cityofpleasantonca.gov/gov/depts/os/env/cap/resources.asp. Accessed October 3, 2022.</p>		

As shown in Table 3.2-7, the General Plan, which the Housing Element Update constitutes an update to, and the Municipal Code include policies and requirements that incorporate and implement the control measures included in the 2017 Clean Air Plan. As such, the Housing Element Update would be consistent with the 2017 Clean Air Plan under this criterion. Therefore, impacts would be less than significant.

The Housing Element Update Would Not Disrupt or Hinder Implementation of Any Air Quality Plan Control Measures

As described above and shown in Table 3.2-7, the Housing Element Update incorporate policies that are consistent with the control measures included in the 2017 Clean Air Plan. The Housing Element Update does not include any components that would disrupt or hinder implementation of any control measures, such as precluding an extension of a planned transit line or bike bath or proposing excessive parking, nor would the Housing Element Update inhibit the General Plan’s policies that support the implementation of AQP control measures. As such, development consistent with the Housing Element Update would not hinder the BAAQMD from implementing the control measures in the 2017 Clean Air Plan, and this impact would be less than significant.

The Housing Element Update Would Not Increase Vehicle Miles Traveled Per Capita

The BAAQMD determines a plan, such as the Housing Element Update, to potentially conflict with the applicable AQP if the plan facilitates growth in VMT that exceeds the growth in population over that same time. As discussed in Section 3.12, Population and Housing, as of January 2021, the City

had a population of 78,371. Therefore, assuming maximum buildout of the potential sites for housing, a conservative population estimate by 2031 is 96,400 residents.

The Housing Element Update would result in a population growth of at least 23 percent through 2031, although the City would likely experience additional population growth beyond 2031. Full buildout of the Housing Element Update would result in a growth in VMT by approximately 12 percent through 2040. The estimated VMT and population growth from 2021 to 2031 are both shown below in Table 3.2-8. As shown therein, implementation of the Housing Element Update would result in a population growth which outpaces the forecasted VMT growth. As such, population growth would outpace forecasted VMT growth and the Housing Element Update would be considered to not exceed BAAQMD-approved significance thresholds or conflict with or obstruct implementation of the AQP.

Table 3.2-8: Housing Element Update VMT and Population Growth

Year	Daily VMT	Population
2021	2,210,062	78,371
Buildout 2031	2,467,840	96,400
Percent Increase (percent)	11.66	23.00
Notes: VMT = Vehicle Miles Traveled		

Overall

In conclusion, overall development facilitated by the Housing Element Update would be consistent with the 2017 Clean Air Plan. The Housing Element Update would support the primary goals of the AQP, include applicable control measures from the AQP, and neither disrupt nor hinder implementation of any AQP control measures. Moreover, the Housing Element Update would facilitate population growth which outpaces forecasted VMT growth through buildout of the Housing Element Update. Therefore, development consistent with the Housing Element Update would not conflict with the 2017 Clean Air Plan and this impact would be less than significant after mitigation.

Level of Significance Before Mitigation

Potentially significant impact.

Mitigation Measures

MM AIR-1a Prior to the issuance of a grading or building permit, whichever is sooner, the project applicant for a potential site for rezoning shall submit an air quality construction plan detailing the proposed air quality construction measures related to the project such as construction phasing, construction equipment, and dust control measures, and such plan shall be approved by the Director of Community Development. Air quality construction measures shall include Basic Construction Mitigation Measures, as approved by the Bay Area Air Quality Management District (BAAQMD) in 2017, and, where construction-related emissions would exceed the applicable thresholds,

Additional Construction Mitigation Measures, as recommended by the BAAQMD, shall be implemented to reduce emissions to acceptable levels. The air quality construction plan shall be included on all grading, utility, building, landscaping, and improvement plans during all phases of construction and for access roads, parking areas, and staging areas at construction sites.

MM AIR-1b

For project sites where new sensitive receptors, such as residences, would be located within siting distances recommended by the Bay Area Air Quality Management District (BAAQMD) and California Air Resources Board (ARB), currently published in the ARB Air Quality and Land Use Handbook: A Community Health Perspective, or the latest available guidance as determined by the City of Pleasanton as the lead agency, to sources of toxic air contaminants (TACs), the following measures shall be implemented for development on such sites to reduce exposure to TACs and improve indoor and outdoor air quality:

Indoor Air Quality—In accordance with the recommendations of the BAAQMD, appropriate measures (refer to Section 5 of the BAAQMD CEQA Guidelines) shall be incorporated into building design in order to reduce the potential health risk due to exposure of sensitive receptors to TACs, including, but not limited to:

- (a) locate sensitive receptors as far as possible from any freeways, major roadways or other sources of pollution (e.g. loading docks, parking lots);
- (b) incorporate tiered plantings of trees (redwood, deodar cedar, live oak, and/or oleander) to the maximum extent feasible between the sources of pollution and sensitive receptors;
- (c) install, operate and maintain in good working order a central heating ventilation and air conditioning (HVAC) system or other air take system in the building, or in each residential unit, that meets or exceeds an efficiency standard of minimum efficiency reporting values (MERV) 13, including the following features: installation of high efficiency filter and /or carbon filter to filter particulates and other chemical matter from the building (either high efficiency particulate air [HEPA] filters or ASHRAE 85 percent supply filters);
- (d) retain a qualified HVAC consultant or Home Energy Rating System (HERS) rater during the design phase of the project to locate the HVAC system based on exposure modeling from pollutant sources;
- (e) install indoor air quality monitoring in units in buildings; and
- (f) applicants shall maintain, repair or replace HVAC systems on an ongoing and as-needed basis, or prepare two operation and maintenance manuals for the HVAC systems and the filters: one manual shall be included in the recorded Conditions Covenants and Restrictions (CC&Rs) and distributed to building maintenance staff; the other manual shall be a separate homeowners' manual with operating instructions and maintenance and replacement schedule for the HVAC system and filters that is distributed to owners.

Project applicants shall retain a qualified air quality consultant to prepare a Health Risk Assessment (HRA) in accordance with BAAQMD requirements to determine the exposure of project residents/occupants/users to air pollutants prior to PUD approval, issuance of a grading permit, or issuance of a building permit, whichever is sooner. The HRA shall be submitted to the Community Development Department for review and approval. The applicant shall implement the approved HRA mitigation measure recommendations, if any, in order to reduce exposure to TACs below BAAQMD thresholds of significance at the time of the project approval.

Outdoor Air Quality—Individual and common exterior open space, including playgrounds, patios, and decks, shall either be shielded from the source of air pollution by buildings or otherwise buffered to further reduce air pollution for project occupants.

Level of Significance After Mitigation

Less than significant impact with mitigation incorporated.

Cumulative Criteria Pollutant Emissions Impacts

Impact AIR-2: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments could result in a cumulatively considerable net increase of any criteria pollutant for which the project region is nonattainment under an applicable federal or State ambient air quality standard.

The BAAQMD CEQA Guidelines contains specific guidance and recommendations for evaluating the significance of plan-level projects. For criteria air pollutants and precursors, the BAAQMD does not have a recommended threshold of significance for the construction phase. For the operational phase, the BAAQMD recommends that projects be evaluated for their consistency with the current AQP control measures and whether the projected VMT or vehicle trip increase is less than or equal to the projected population increase. These elements are discussed below.

Construction

The Housing Element Update would not directly result in construction of any development or infrastructure; however, future development facilitated by the Housing Element Update would result in short-term construction-related criteria pollutant emissions that have the potential to have an adverse effect on air quality. Short-term criteria pollutant emissions would occur during demolition, site preparation, grading, building construction, paving, and architectural coating activities associated with individual development projects. ROG and NO_x emissions are primarily associated with gasoline and diesel equipment exhaust and the application of architectural coatings. Fugitive dust emissions (PM₁₀ and PM_{2.5}) are primarily associated with site preparation and vary as a function of such parameters as soil silt content, soil moisture, wind speed, acreage of disturbance area, and VMT by construction vehicles on- and off-site. Typical construction equipment associated with development and redevelopment projects includes dozers, graders, excavators, loaders, and trucks.

Although the exact coverage, location, or duration of future construction projects is unknown at the time of preparation of this analysis, future development activities would generally entail demolition, site preparation, grading, building construction, paving, and painting activities. Because several of

the potential sites for housing are currently development, many new development projects facilitated by the Housing Element Update would likely require the demolition of existing structures to make room for newer ones. Fugitive dust emissions would typically be greatest during building demolition, site preparation, and grading activities due to the disturbance of soils and transport of material. NO_x emissions would also result from the combustion of diesel fuels used to power off-road heavy-duty vehicles and equipment (e.g., backhoes, bulldozers, excavators). The types and quantity of equipment, as well as duration of construction activities, would be dependent on project-specific conditions. Larger development projects would require more equipment over a longer timeframe than that required for redevelopment of a single-family home or otherwise small development project.

As discussed above in Thresholds of Significance, the BAAQMD does not require plan-level thresholds of significance for construction emissions; however, the BAAQMD does maintain and recommend project-level thresholds to which potential future development projects consistent with the Housing Element Update would be subject. In addition, the BAAQMD's CEQA Air Quality Guidelines identify and recommend a series of "Basic" measures to control and reduce construction-related emissions. For all projects, the BAAQMD recommends implementation of eight Basic Construction Measures to reduce construction fugitive dust emissions.³⁵ The BAAQMD determines a less than significant impact with respect to construction fugitive dust emissions if the following Basic Construction Mitigation Measures are implemented during project construction:

- All exposed surfaces (e.g., parking areas, staging areas, soil piles, graded areas, and unpaved access roads) shall be watered two times per day.
- All haul trucks transporting soil, sand, or other loose material off-site shall be covered.
- All visible mud or dirt trackout onto adjacent public roads shall be removed using wet power vacuum street sweepers at least once per day. The use of dry power sweeping is prohibited.
- All vehicle speeds on unpaved roads shall be limited to 15 mph.
- All roadways, driveways, and sidewalks to be paved shall be completed as soon as possible. Building pads shall be laid as soon as possible after grading unless seeding or soil binders are used.
- Idling times shall be minimized either by shutting equipment off when not in use or reducing the maximum idling time to 5 minutes (as required by the California ATCM Title 13, Section 2485 of the California Code of Regulations). Clear signage shall be provided for construction workers at all access points.
- All construction equipment shall be maintained and properly tuned in accordance with manufacturer's specifications. All equipment shall be checked by a certified mechanic and determined to be running in proper condition prior to operation.
- Post a publicly visible sign with the telephone number and person to contact at the City or facility regarding dust complaints. This person shall respond and take corrective action within

³⁵ Bay Area Air Quality Management District (BAAQMD). 2017. California Environmental Quality Act Air Quality Guidelines.

48 hours. The BAAQMD phone number shall also be visible to ensure compliance with applicable regulations.

As discussed above in Thresholds of Significance, a criterion identified by the BAAQMD for determining plan-level significance with respect to criteria air pollutants and ozone precursors is determining project consistency with the current AQP control measures, which are intended to ensure the region's achievement and maintenance of attainment of federal and State AAQS. As the SFBAAB is currently designated as a nonattainment area for PM, and considering that the BAAQMD's recommended significance threshold for construction fugitive dust is binary—meaning if a project includes dust control BMPs then construction fugitive dust emissions would be less than significant, but if a project does not explicitly include dust control BMPs then construction fugitive dust emissions would be potentially significant—MM AIR-1a would be required to ensure that individual development projects facilitated by the Housing Element Update would result in less than significant construction fugitive dust impacts. MM AIR-1a contains BAAQMD's Basic Construction Mitigation Measures Recommended for All Proposed Projects, as included in the BAAQMD's 2017 CEQA Air Quality Guidelines, which are recommended by the BAAQMD to reduce construction fugitive dust emissions. As such, with implementation of MM AIR-1a, this impact would be less than significant.

Operation

The Housing Element Update would allow new residential development, and, to present a conservative analysis, it was assumed all housing facilitated by the Housing Element Update would become fully operational in 2031. Operational air quality emissions are principally generated from area, energy, and mobile sources. Area source emissions are the combination of many small emission sources that include use of outdoor landscape maintenance equipment, use of consumer products such as cleaning products, use of fireplaces and hearths, and periodic reapplication of architectural coatings. Criteria pollutants generated from energy sources are principally from the on-site use of natural gas; electricity consumption is not included in energy source emissions as those potential emissions would be generated as the result of the operation of an electricity generation facility which may or may not be within the same air basin and under the same attainment status as the end-use. Mobile source emissions result from the vehicle activity associated with the operation of a given land use development project, including resident, worker, and patron vehicle trips.

Implementation of the Housing Element Update could result in the development and operation of up to 7,787 net new residential units. It should be noted that although the Housing Element Update provides policies and programs to facilitate new housing construction, the Housing Element Update does not propose any specific development projects, nor is the City required to construct any particular project. As the City receives applications for subsequent development, those applications would be reviewed by the City for compliance with MM AIR-1a and MM AIR-1b and the programs and policies in the General Plan, which may require additional site specific or project specific measures to reduce any potential impacts and ensure that impacts remain less than significant.

Consistency with Air Quality Plan Control Measures

As previously mentioned, the BAAQMD's plan-level guidance does not require an emissions inventory of criteria air pollutants for plan-level analysis; however, the BAAQMD recommends that a

proposed plan be analyzed for consistency with the current AQP control measures to determine plan-level impact significance. As discussed in Impact AIR-1, the Housing Element Update would be consistent with the 2017 Clean Air Plan control measures, as illustrated in Table 3.2-7. As such, the Housing Element Update would be consistent with the current AQP control measures, and this impact would be less than significant.

Housing Element Update Vehicle Miles Traveled and Population Growth

As previously mentioned, the BAAQMD's plan-level guidance does not require an emissions inventory of criteria air pollutants for plan-level analysis; however, the BAAQMD recommends that the second criterion used for determining plan-level impact significance is to analyze a proposed plan's projected VMT growth versus its projected population growth from existing conditions through its planning horizon year (2031 in this case). As discussed in Impact AIR-1, if a proposed plan's projected VMT growth outpaces its projected population growth, then that proposed plan would result in a cumulatively considerable net increase in criteria pollutants, and this impact would be potentially significant. As discussed in Impact AIR-1, the VMT growth facilitated by the Housing Element Update would constitute an approximately 12 percent growth through at least 2031, while population growth facilitated by the Housing Element Update would constitute an approximately 23 percent growth through 2031. Therefore, the forecasted population growth would outpace the forecasted VMT growth facilitated by the Housing Element Update. As such, this impact would be less than significant.

Level of Significance Before Mitigation

Potentially significant impact.

Mitigation Measures

Implement MM AIR-1a and MM AIR-1b.

Level of Significance After Mitigation

Less than significant impact with mitigation incorporated.

Sensitive Receptors Exposure to Toxic Air Contaminant Concentrations

Impact AIR-3: **Development consistent with the Housing Element Update, rezonings, and General and Specific Plan Amendments could expose sensitive receptors to substantial pollutant concentrations.**

Within the SFBAAB, localized risks are primarily associated with exposure to TACs and PM_{2.5} emissions. As discussed above in Environmental Setting, TACs are a defined set of airborne pollutants that may pose a present or potential hazard to human health, and PM_{2.5} is a type of particle pollution that pose an increased risk because they can penetrate the deepest parts of the lung, leading to and exacerbating heart and lung health effects. Common sources of TACs and PM_{2.5} emissions are stationary sources (e.g., dry cleaners, diesel backup generators, and gasoline stations), which are subject to BAAQMD permit requirements. Another common and often more significant source type is on-road motor vehicles on high-volume roads, such as I-580 and I-680, and off-road sources, such as construction equipment and diesel-powered trains traveling on Caltrain corridors. Although it is not anticipated that development consistent with the Housing Element Update would

include any new, large stationary sources of emissions, it would result in new sensitive receptors (primarily residential receptors) near existing sources of emissions. The BAAQMD Guidelines recommend a Community Risk Reduction Plan (CRRP) that would bring TAC and PM_{2.5} concentrations in the SFBAAB down to acceptable levels as identified by the local jurisdiction and approved by BAAQMD. The following discussion provides an analysis of the Housing Element Update in relation to existing policies.

Community Risk and Hazards–Plan Land Use Diagram Special Overlay Zones

Consistent with BAAQMD’s CEQA Air Quality Guidelines, the Housing Element Update would not result in a significant community risk and hazard impact if the land use diagram identifies special overlay zones around existing and planned sources of TACs and PM_{2.5}, including special overlay zones of at least 500 feet on each side of all freeways and high-volume roadways, and the plan identifies goals, policies, and objectives to minimize potentially adverse impacts. For example, the ARB Air Quality and Land Use Handbook recommends avoiding the siting of new sensitive land uses (e.g., residences, schools, etc.) within:

- 300 feet of large gasoline fueling stations (with a throughput of more than 3.6 million gallons of gasoline per year);
- 300 feet of dry cleaning operations;
- 500 feet of freeways, urban roads with 100,000 vehicles/day, or rural roads with 50,000 vehicles/day; and
- 1,000 feet of a major rail service or maintenance yard.

As previously discussed in Impact AIR-1, once adopted, General Plan would be amended to include the Housing Element Update, therefore, the General Plan is the plan against which this criteria is evaluated. Policy 3 in Chapter 9, Air Quality and Climate Change Element, of the General Plan requires that sensitive land uses shall be separated from sources of air pollution. Program 3.2 states that new sensitive receptors, such as residences (including residential care and assisted living facilities for the elderly), childcare centers, schools, playgrounds, and medical facilities shall be located away from point sources of air pollution and busy traffic corridors following the California Air Resource Board (ARB) recommendations. Program 3.3 requires site-specific studies of air quality health risk for development that would place sensitive receptors closer than 500 feet from the edge of a freeway or close to a significant point source of air pollution. For project sites that would be located within siting distances recommended by the BAAQMD and ARB, currently published in the ARB Air Quality and Land Use Handbook: A Community Health Perspective, or the latest available guidance as determined by the City of Pleasanton as the lead agency, MM AIR-1b is required to conduct a site-specific HRA and to mitigate potential risk to potential new sensitive receptors to less than significant levels. The General Plan establishes a special overlay zone within which future individual development projects facilitated by the Housing Element Update would need to prepare a site-specific analysis to identify and mitigate potentially significant health impacts. Once adopted, the Housing Element Update would be part of the General Plan, and none of the proposed goals, policies, and programs included in the Housing Element Update would result in the preclusion, removal, or conflict with existing General Plan policies establishing this zone for further analysis;

therefore, the Housing Element Update would be considered consistent with this plan-level consideration recommended by the BAAQMD. Furthermore, future development projects consistent with the Housing Element Update would need to demonstrate compliance with the strategies included in the CAP 2.0, including measures that have air quality benefits such as sustainable building design, energy conservation, and strategies to reduce VMT.

Community Risk and Hazards—Goals, Policies, and Objectives for Reducing Impacts

As discussed above in Thresholds of Significance, a proposed plan must also identify goals, policies, and objectives to minimize potential impacts and create overlay zones around sources of TACs, PM_{2.5}, and hazards to be considered to result in less than significant impacts related to exposing sensitive receptors to substantial pollutant concentrations. As discussed above in Regulatory Framework, the General Plan (which would include the Housing Element Update, once adopted) contains several policies and programs that aim to reduce the potential growth of vehicle use through encouraging the use of alternative modes of transportation, monitoring and improving existing sources of TACs throughout the City, and reducing overall health impacts related to air quality in general.

In addition to Chapter 9, Air Quality and Climate Change Element, of the General Plan contains Policy 3, Program 3.2, and Program 3.3 which require sensitive land uses be separated from sources of air pollution. Chapter 9, Air Quality and Climate Change Element, of the General Plan also contains, which incorporates air quality as an elevated consideration in the review of proposed development projects. Program 5.1 states the City's intent is to include air quality as a factor in the City's environmental review process. Program 5.2 requires projects which generate high levels of air pollutants to incorporate air quality mitigation in their design. Finally, Program 5.3 establishes the City's intent to adopt an ordinance regulating burning indoors and outdoors that may consider allowable hours and setbacks from neighbors. Furthermore, for project sites that would be located within siting distances recommended by the BAAQMD and ARB, currently published in the ARB Air Quality and Land Use Handbook: A Community Health Perspective, or the latest available guidance as determined by the City of Pleasanton as the lead agency, MM AIR-1b requires the preparation of a site-specific HRA and to mitigate potential risk to potential new sensitive receptors to less than significant levels.

Overall

Adherence to the policies and programs of the General Plan would ensure compliance with existing BAAQMD policies to ensure the reduction of sensitive receptors exposure to toxic air contaminant. Therefore, this impact would be less than significant.

Level of Significance Before Mitigation

Potentially significant impact.

Mitigation Measures

Implement MM AIR-1b.

Level of Significance After Mitigation

Less than significant impact with mitigation incorporated.

Objectionable Odors Exposure

Impact AIR-4: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not result in other emissions (such as those leading to odors) adversely affecting a substantial number of people.

While odors do not present a health risk of themselves, they are often considered a nuisance by people who live, work, or otherwise are located near outdoor odor sources. The BAAQMD's CEQA Air Quality Guidelines identify a screening distance for 1 and 2 miles for the most common odor-generating land uses. Projects located outside of these screening distances would be presumed to not be exposed to odors, while projects within these screening distances present a potential to be exposed to odors.

As discussed above in Thresholds of Significance, a plan-level analysis must acknowledge odor sources within the city and identify policies, goals, and objectives aimed at reducing potential odor impacts to ensure that potential impacts would be less than significant. As described in the BAAQMD's 2017 CEQA Air Quality Guidelines, land uses associated with odor complaints typically include agricultural operations, wastewater treatment plants, landfills, and certain industrial operations. The city contains several of the land uses listed by the BAAQMD as potential odor sources, such as the Dublin-San Ramon Wastewater Treatment Plant, the Pleasanton Garbage Service Transfer Station, and various coffee shops throughout the city that all have the potential to roast coffee beans on-site. As the city is a mostly urbanized and built-out city, it currently has, and the Housing Element Update would facilitate future development of, sensitive receptors within the identified screening distances of existing odor sources.

Public records retrieved from the BAAQMD show that from January 2019 through June 2022, 81 confirmed odor complaints and 24 unconfirmed odor complaints were filed in the city. Among those complaints, Vulcan Materials, which is located at 52 El Charro Road, received 98 complaints (confirmed and unconfirmed) about odors including "burning rubber," "burning smoke," and "asphalt." This facility is located approximately 1.5 miles east of Site 21a and b (Kiewit) and 20 (Boulder Court) and 1 mile north of Site 27 (PUSD-Vineyard). The General Plan, Air Quality and Climate Change Element, Program 8.1 states that continued efforts shall be made to have the asphalt plant relocated away from Vineyard Avenue residents. Program 8.2 states that the City shall continue working with the Dublin-San Ramon Services District (DSRSD) to ensure that odors from the sewage-treatment plant are minimized and other air emissions meet all regulatory requirements. In addition, BAAQMD Regulation 7 limits emissions of odorous substances within the SFBAAB and would apply to any future odor source within the city. Therefore, compliance with the applicable regulations in the General Plan, as well applicable BAAQMD rules and regulations, would minimize odor emissions from adversely affecting a substantial number of people within the city, and this impact would be less than significant.

Level of Significance

Less than significant impact.

3.2.4 - Cumulative Impacts

The geographic scope of the cumulative impact analysis for air quality is the SFBAAB. This analysis evaluates whether the impacts of the Housing Element Update, together with the impacts of cumulative development, would result in a cumulatively significant impact with respect to air quality. This analysis then considers whether the incremental contribution of the impacts associated with the implementation of the Housing Element Update would be significant. Both conditions must apply for a project's cumulative effects to rise to the level of significance.

By its nature, air pollution is largely a cumulative impact resulting from emissions generated over a large geographic region. The nonattainment status of regional pollutants is a result of past and present development within an air basin, and this regional impact is a cumulative impact. In other words, new development projects (such as development consistent with the Housing Element Update) within the SFBAAB would contribute to this impact only on a cumulative basis. No single project would be sufficient in size, by itself, to result in nonattainment of regional air quality standards. Instead, a project's emissions may be individually limited but cumulatively considerable when taken in combination with past, present, and future development projects. All new development that would result in an increase in air pollutant emissions above those assumed in regional AQPs would contribute to cumulative air quality impacts.

The cumulative analysis focuses on whether a specific project (the Housing Element Update) would result in cumulatively considerable emissions. According to Section 15064(h)(4) of the State CEQA Guidelines, the existence of significant cumulative impacts caused by other projects alone does not constitute substantial evidence that a project's incremental effects would be cumulatively considerable. Rather, the determination of cumulative air quality impacts for construction and operational emissions is based on whether a project would result in regional emissions that exceed the BAAQMD regional thresholds of significance. Projects that generate emissions below the significance thresholds would be considered consistent with regional air quality planning efforts and would not generate cumulatively considerable emissions.

The nonattainment regional pollutants of concern for the SFBAAB are ozone, PM₁₀ and PM_{2.5}. Ozone is a regional pollutant formed by a photochemical reaction in the atmosphere and not directly emitted into the air. Ozone precursors, such as VOC and NO_x, react in the atmosphere in the presence of sunlight to form ozone. Therefore, the BAAQMD ozone threshold is based on the emissions of the ozone precursors VOC and NO_x. The Housing Element Update's consistency with the BAAQMD thresholds of significance for determining air quality impacts at the plan level is further discussed in the following sections.

2017 Clean Air Plan Consistency

To comply with this threshold, the BAAQMD's CEQA Air Quality Guidelines provide that land use plans should incorporate policies and requirements that ensure they do not inhibit attainment of air quality standards and that they assist in improving local and regional air quality.

In particular, the BAAQMD evaluates criteria pollutants resulting from long-range plans, such as the Housing Element Update, by evaluating consistency with the AQP as well as a comparison of project

VMT to projected population increase. As noted in Impact AIR-1 above, the development consistent with the Housing Element Update would be consistent with the 2017 Clean Air Plan since it would facilitate population growth which outpaces forecasted VMT growth. Moreover, development consistent with the Housing Element Update would support the primary goals of the AQP, include applicable control measures from the AQP, and neither disrupt nor hinder implementation of any AQP control measures.

To reduce potential emissions impacts, the BAAQMD further recommends that air quality related goals, policies, performance measures, and standards should be incorporated within the context of the plan itself, rather than introduced as corrective actions within a plan's EIR. As illustrated in Impact AIR-1, the General Plan contains policies and programs which would apply to the development consistent with the Housing Element Update that incorporate and implement the control measures included in the 2017 Clean Air Plan. Moreover, as discussed in Impact AIR-1, the Housing Element Update would support the overall goals of the 2017 Clean Air Plan with inclusion of the measures provided in MM AIR-1a and MM AIR-1b.

As previously discussed, as the SFBAAB is currently designated as a nonattainment area for PM, and, considering that the BAAQMD's recommended significance threshold for construction fugitive dust is binary—meaning if a project includes dust control BMPs then construction fugitive dust emissions would be less than significant but if a project does not explicitly include dust control BMPs then construction fugitive dust emissions would be potentially significant—MM AIR-1a would be required to ensure that individual development projects facilitated by the Housing Element Update would result in less than significant construction fugitive dust impacts. MM AIR-1a contains BAAQMD's Basic Construction Mitigation Measures Recommended for All Proposed Projects contained in the BAAQMD's 2017 CEQA Air Quality Guidelines, which are recommended by the BAAQMD to ensure construction fugitive dust emissions are less than significant. As such, impacts related to construction fugitive dust emissions would be less than significant with implementation of MM AIR-1a.

Consistent with BAAQMD's CEQA Air Quality Guidelines, the Housing Element Update would not result in a potentially significant community risk and hazard impact because the General Plan identifies special overlay zones around existing and planned sources of TACs, including special overlay zones of at least 500 feet on each side of all freeways and high-volume roadways (or another BAAQMD-approved modeled distance), and the General Plan identifies goals, policies, and objectives to minimize potentially adverse impacts for projects within those special overlay zones. Additionally, for project sites that would be located within siting distances recommended by the BAAQMD and ARB, currently published in the ARB Air Quality and Land Use Handbook: A Community Health Perspective, or the latest available guidance as determined by the City of Pleasanton as the lead agency, MM AIR-1b requires the preparation of a site-specific HRA and to mitigate potential health risk to new sensitive receptors at future development sites to less than significant levels. Therefore, the Housing Element Update would be consistent with the 2017 Clean Air Plan and would therefore not result in a cumulatively considerable net increase in criteria air pollutants and ozone precursors, resulting in a conflict with the applicable air quality plan with mitigation incorporated.

Criteria Air Pollutant and Ozone Precursor Emissions

As discussed above in Thresholds of Significance, a plan-level analysis must demonstrate project consistency with AQP control measures and a projected VMT increase that is less than or equal to its projected population growth for this impact to be less than significant.

As explained above, development consistent with the Housing Element Update would be consistent with the 2017 Clean Air Plan since it would facilitate population growth which outpaces forecasted VMT growth. The Housing Element Update would support the primary goals of the AQP, include applicable control measures from the AQP, and neither disrupt nor hinder implementation of any AQP control measures. The Housing Element Update aims to facilitate balanced growth between housing and employment in the city, which would limit operational emissions through reducing residents' dependency on vehicular transportation.

All new development and redevelopment in the city would be required to meet the BAAQMD rules and regulations, including Regulation 6, Rule 3 that restrict the installation of wood-burning fireplaces into a new building and Regulation 8, Rule 3 that limits the allowed VOC levels in the architectural coatings applied onto buildings in the city. The 2019 California Code of Regulations, Title 24, Part 6, standards also now require that all homes built in California to have zero-net-energy use, which is achieved through energy efficiency measures as well required rooftop solar photovoltaic systems. Moreover, the development consistent with the Housing Element Update would be required to implement MM AIR-1a to future development projects include dust control and other measures to reduce construction-related emissions, as recommended by the BAAQMD.

Compliance with the applicable policies and programs in the General Plan, as well applicable State and BAAQMD rules and regulations, would minimize the potential air quality impacts resulting from implementation of the Housing Element Update, which encourages or requires the use of fuel-efficient equipment, vehicles, and BMPs. Mandatory compliance with design review regulations and policies in the Pleasanton Municipal Code and General Plan would ensure operation-related air quality impacts associated with development consistent with the Housing Element Update would be less than significant on an individual project basis, and the City would review those future projects under its standard design review procedures. As such, the Housing Element Update would not result in a cumulatively considerable net increase in criteria air pollutants and ozone precursors with mitigation incorporated.

Sensitive Receptor Exposure to Substantial Pollutant Concentrations

As discussed under Impact AIR-3, localized risks are primarily associated with exposure to TAC emissions. Common sources of TAC emissions are stationary sources (e.g., dry cleaners, diesel backup generators, and gasoline stations), which are subject to BAAQMD permit requirements. Another common and often more significant source type is on-road motor vehicles on high-volume roads, such as I-580 and I-680, and off-road sources such as construction equipment and diesel-powered locomotives. Although the Housing Element Update does not propose any specific development and does not include specific plans for any new stationary sources of emissions, it could result in new residences near existing sources of TACs.

Consistent with BAAQMD's CEQA Air Quality Guidelines, a long-range plan would not result in a potentially significant community risk and hazard impact if the land use diagram identifies special overlay zones around existing and planned sources of TACs, including special overlay zones of at least 500 feet on each side of all freeways and high-volume roadways, and the plan identifies goals, policies, and objectives to minimize potentially adverse impacts. Because the General Plan Land Use Program 3.3 requires site-specific studies of air quality health risk for development that would place sensitive receptors closer than 500 feet from the edge of a freeway or close to a significant point source of air pollution, the General Plan already establishes this special overlay zone. The policies included as part of the Housing Element Update would not result in the preclusion, removal, or conflict with existing General Plan policies establishing this zone for further analysis, therefore the Housing Element Update would be considered consistent with this plan-level consideration recommended by the BAAQMD.

Moreover, as discussed in Impact AIR-3, the General Plan contains policies and programs that aim to reduce the potential growth of vehicle use by encouraging the use of alternative modes of transportation, monitoring and improving existing sources of TACs throughout the city, and reducing overall health impacts related to air quality in general. As such, the Housing Element Update would not result in a cumulatively considerable net increase in the exposure of sensitive receptors to substantial pollutant concentration and impacts would be less than significant.

Odor Impacts

As discussed in Impact AIR-4, land uses associated with odor complaints typically include agricultural operations, wastewater treatment plants, landfills, and certain industrial operations such as chemical and other manufacturing. As discussed above in Thresholds of Significance, a plan-level analysis must acknowledge odor sources in a planning area and identify policies, goals, and objectives aimed at reducing potential odor impacts to ensure that potential impacts would be less than significant. Several of the land uses listed by the BAAQMD as potential odor sources are within the city. Because the city is a mostly urbanized and built-out city, it currently has, and the Housing Element Update would facilitate future development of odor receptors within the identified screening distances of existing odor sources.

General Plan Odor Program 8.1 states that continued efforts shall be made to have the asphalt plant relocated away from Vineyard Avenue residents. Program 8.2 states that the City shall continue working with the DSRSD to ensure that odors from the sewage-treatment plant are minimized and other air emissions meet all regulatory requirements. In addition, BAAQMD Regulation 7 limits emissions of odorous substances within the SFBAAB and would apply to any future odor source within the city. Therefore, compliance with the applicable federal, State, and local regulations, including the General Plan, Municipal Code, and applicable BAAQMD rules and regulations would minimize odor emissions from adversely affecting a substantial number of people within the city. As such, the Housing Element Update would not result in a cumulatively considerable odor impact and impacts would be less than significant.

Level of Cumulative Significance Before Mitigation

Potentially significance impact.

Cumulative Mitigation Measure

Implement MM AIR-1a and MM AIR-1b.

Level of Cumulative Significance After Mitigation

Less than significant impact with mitigation incorporated.

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3.3 - Biological Resources

3.3.1 - Introduction

This section of the Draft Program Environmental Impact Report (Draft Program EIR) describes the existing biological resources within the potential sites for rezoning, including special-status plant and wildlife species, sensitive habitats, regulated waterways and wetlands, mature native trees, and wildlife movement corridors. This section evaluates impacts to biological resources that are anticipated to occur from implementation of the proposed 2023-2031 (6th Cycle) Housing Element Update, rezonings, General Plan and Specific Plan Amendments (collectively referred to herein as the Housing Element Update). This section also identifies mitigation measures to reduce these potential effects to less than significant levels. Future projects facilitated by the Housing Element Update will be evaluated for project-specific impacts related to biological resources at the time they are proposed.

Descriptions and analysis in this section are based, in part, on a review of the City of Pleasanton General Plan (General Plan), Vineyard Avenue Corridor Specific Plan, Hacienda PUD Development Plan Design Guidelines, and the Pleasanton Municipal Code (Municipal Code). Once the Housing Element Update is adopted, the General Plan would be amended to include the Housing Element Update. Therefore, all references to the General Plan include the Housing Element Update.

3.3.2 - Environmental Setting

Literature Review and Records Searches to Identify Existing Biological Resources

FirstCarbon Solutions (FCS) Biologists examined existing environmental documentation for the potential sites for rezoning and the City of Pleasanton Planning Area. This documentation included a desktop level review of the City of Pleasanton General Plan 2005-2025 EIR, Vineyard Avenue Corridor Specific Plan, Downtown Specific Plan, the Pleasanton Municipal Code (Municipal Code), 2015-2023 (5th Cycle) Housing Element Supplemental Environmental Impact Report (State Clearinghouse No. 2011052002), final draft of the East Alameda County Conservation Strategy, and federal and State register listings, protocols, and species data provided by the United States Fish and Wildlife Service (USFWS), California Native Plant Society (CNPS), and the California Department of Fish and Wildlife (CDFW).

Special-status Species Database Search

An FCS Biologist compiled a list of threatened, endangered, and otherwise special-status species previously recorded within an approximately 5-mile radius of the potential sites for rezoning. The list was also based on a search of the USFWS's Information for Planning and Consultation (IPaC) online planning tool as well as a query of the California Natural Diversity Database (CNDDDB), and the CNPS Electronic Inventory (CNPSEI) for the *Livermore, Dublin, Niles, and La Costa Valley, California* USGS

7.5-minute Topographic Quadrangle Maps.^{1,2,3,4} The database search results can be found in Appendix D.

Physical Habitat/Vegetation

The Planning Area includes a wide variety of physical habitats and land cover types that include grassland, brushland, woodlands, oak savannas, wetlands, and riparian.^{5,6} With the exception of pockets to the west and south, most of the Planning Area has experienced ongoing anthropogenic influences which have resulted in extensive development (Exhibit 3.3-1). Exhibit 3.3-1 is a medium scale map (1 inch:9,000 feet; representative fraction of 1:108,000) and provides a generalized indication of the physical habitats found throughout the city, but is not necessary indicative of current on-site conditions. These generalized physical habitats are described in further detail below.

Grassland/Agriculture

Grasslands are the dominant habitat/land cover type found within the hilly locations of the Planning Area. Because of livestock grazing, non-native annual species, such as barnyard grass, bromes, goat grass, nit grass, Italian rye, wild rye, wild oats, rigput grass, barley, soft chess, fescue, oatgrass, and Kentucky bluegrass have mostly replaced native grasses. Native grasses still growing in the Planning Area include perennial native bunchgrasses, including purple needlegrass and nodding needlegrass. Common non-native herbaceous plants in grassland habitats include bur clover, fennel, filaree, a variety of thistles, prickly lettuce, mustards, and white clover. After winter rains, the blossoms of indigenous plants, such as California buttercup, California poppy, lupine, common chickweed, miner's lettuce, clovers, and fuchsia—may be found in the grassland areas. The CDFW has identified purple needle grass, a native species found within the Planning Area as a sensitive natural community. The CDFW also considers the following plant species, known to occur in or near the Planning Area, as sensitive: San Joaquin saltbrush, Diablo helianthella, and Congdon's tarplant.

Brushland

Brushland, also known as chaparral and scrub habitats, grows in patches on the sides and crests of ridges and near the bottoms of ravines and creeks. Common shrubs found in these areas include coyote brush, California toyon, bush monkey flower, poison oak, California sagebrush, California buckwheat, silver bush lupine, and coffee berry. Lower profile plants, such as purple needlegrass,

¹ United States Fish and Wildlife Service (USFWS). 2022. Information for Planning and Consultation. Website: <https://ecos.fws.gov/ipac/>. Accessed May 4, 2022.

² California Department of Fish and Wildlife (CDFW). 2022. CNDDDB RareFind 5 California Natural Diversity Database Query for Special-Status Species. Website: <https://map.dfg.ca.gov/rarefind/view/RareFind.aspx>. Accessed May 4, 2022.

³ California Native Plant Society (CNPS). 2022. California Native Plant Society Rare and Endangered Plant Inventory. Website: <http://www.rareplants.cnps.org/>. Accessed May 4, 2022.

⁴ United States Geological Survey (USGS). 2022. National Geospatial Program. Website: https://www.usgs.gov/core-science-systems/national-geospatial-program/us-topo-maps-america?qt-science_support_page_related_con=4#qt-science_support_page_related_com. Accessed May 4, 2022.

⁵ City of Pleasanton. 2009. Pleasanton General Plan 2005-2025 Environmental Impact Report. April.

⁶ City of Pleasanton. 2011. Supplemental Environmental Impact Report Housing Element and Climate Action Plan General Plan Amendment and Rezoning. September.

brome grasses, annual fescues, and hairy coyote mint grow among these shrubs. More brushland plants are indigenous to California than are grassland-area plants.^{7,8}

Woodlands

Woodlands cover nearly the entire upper half of the ridges and extend along stream channels and into the lower slope grassland areas. Trees in these woodlands consist predominantly of oaks, including coast live oak, valley oak, black oak, and blue oak. Commonly scattered among the oaks are California laurel, big-leaf maple, and California buckeye. Other shrubs, herbs, and grasses also grow in woodland areas. On steep, north-facing slopes herbaceous ground cover under tree canopies never exposed to sunlight include miner's lettuce, common chickweed, a variety of ferns, and California polypody.^{9,10}

Oak Savannas

Oak Savannas found along the edges of woodlands and grasslands in the Planning Area are highly variable climax woodlands of blue oak, valley oak, coast live oak, and California buckeye intermixed with non-native annual grassland. The savanna is a transition ecosystem between the grassland and woodland environments, so it is a relatively important habitat for both woodland and grassland animals and insect species. In contrast to woodland canopies which are generally closed, the savanna canopies tend to be 50 to 90 percent open.^{11,12}

Wetlands

Wetlands are habitats found in and along the edges of lakes (referred to as lacustrine habitat), arroyos and canals (riparian habitat), as well as springs and other ephemeral water sources. Wetlands are those areas that are inundated by water at a frequency and duration sufficient to support vegetation typically adapted for life in saturated soil conditions. Wetlands generally include swamps, marshes, bogs, and similar areas. Typical wetland vegetation in the Planning Area includes annual emergent species such as cattails, sedges, watercress, tules, and curly dock. Other species include rabbit's foot grass and water smartweed. Wetlands provide habitat for several wildlife species, including waterfowl and amphibians, such as salamanders.

Riparian

Riparian vegetation grows along streams, arroyos, and drainage ditches. Riparian woodlands dominate some watercourses and include willows, white alders, big-leaf maples, and sycamores, all tolerant of saturated soils. Valley oak, California bay laurel, black walnut, black cottonwood, and California buckeye trees also grow in Pleasanton's riparian areas. Below the riparian tree canopy are shrubs such as poison oak, California blackberry, poison hemlock, wild oats, ryegrass, mulefat, sedges, ferns, bromes, burr clover, stinging nettles, white sweetclover, wild radish, vetch, and mint.

⁷ City of Pleasanton. 2009. Pleasanton General Plan 2005-2025 Environmental Impact Report. April.

⁸ City of Pleasanton. 2011. Supplemental Environmental Impact Report Housing Element and Climate Action Plan General Plan Amendment and Rezonings. September.

⁹ City of Pleasanton. 2009. Pleasanton General Plan 2005-2025 Environmental Impact Report. April.

¹⁰ City of Pleasanton. 2011. Supplemental Environmental Impact Report Housing Element and Climate Action Plan General Plan Amendment and Rezonings. September.

¹¹ City of Pleasanton. 2009. Pleasanton General Plan 2005-2025 Environmental Impact Report. April.

¹² City of Pleasanton. 2011. Supplemental Environmental Impact Report Housing Element and Climate Action Plan General Plan Amendment and Rezonings. September.

Other native species include California button-bush, coyote brush, mugwort, elderberry, snowberry, and California rose. Riparian woodland is one of the most valuable native habitat types in California because it supports a diversity of wildlife species, many of which are rare or uncommon.

Arroyo del Valle, Arroyo Mocho, Arroyo de la Laguna, and other riparian corridors in the Planning Area are all tributaries of Alameda Creek, one of the largest creeks in the San Francisco Bay Area. They provide food, water, migration and dispersal corridors, breeding sites, and thermal cover for wildlife. Development adjacent to riparian habitat often disturbs wildlife that rely on these areas for shelter and food and could also result in the degradation of these areas through the introduction of human activity, feral animals, and contaminants that are typical of urban uses.^{13, 14}

Wildland Overlay

Wildlands are located around the San Antonio Reservoir, Southeast Hills, and the Pleasanton Ridgeland. Additionally, wildlands are also found adjacent to the Arroyo Mocho, Arroyo de la Laguna, Arroyo del Valle, and Alamo Canal waterways. These areas are designated as Wildland Overlay by the General Plan.¹⁵ Wildland Overlay areas contain valuable wildlife habitats and communities and can function as corridors for wildlife movement between major open space areas including regional parks, wilderness areas, and watershed lands.

The purpose of the Wildland Overlay is to retain the habitat and biological diversity that might otherwise be lost. To ensure long-term preservation of the Planning Area's biological diversity, a variety of habitat types need protection in areas large enough to include viable populations of species which may be present in low numbers. Therefore, wildlands include canyons, ridgetops, grasslands, woodlands, brushlands, riparian corridors, wetlands, arroyos, and streams.¹⁶ Very small portions of Sites 8 (Muslim Community Center) and 11 (Old Santa Rita Area) are within a Wildland Overlay (see Exhibit 2-4a in Chapter 2, Project Description) and would remain within a Wildland Overlay under the Housing Element Update (See Exhibit 2-5a in Chapter 2, Project Description).

Special-status Species

Federal, State, and local agencies monitor sensitive and special-status wildlife species and plant communities in California. Special-status species are of relatively limited distribution and generally require specialized habitat conditions.

The CDFW maintains the CNDDDB, which maps known locations of species identified as rare, threatened, endangered, or of special concern by State and federal agencies. The CNDDDB also maps plant and wildlife species considered rare by recognized entities, such as the CNPS.

¹³ City of Pleasanton. 2009. Pleasanton General Plan 2005-2025 Environmental Impact Report. April.

¹⁴ City of Pleasanton. 2011. Supplemental Environmental Impact Report Housing Element and Climate Action Plan General Plan Amendment and Rezoning. September.

¹⁵ City of Pleasanton. 2009. Pleasanton General Plan Land Use Map 2005-2005: General Plan Amendment Resolution No. 12-494 – January 4, 2012.

¹⁶ City of Pleasanton. 2009. Pleasanton General Plan 2005-2025 Environmental Impact Report. April.

Special-status Plants

Special-status plants are those that meet the definition of “endangered, rare, or threatened” under California Environmental Quality Act (CEQA) Guidelines Section 15380. For the purposes of this Draft Program EIR, this includes all plant species that meet any of the following criteria:

- Listed or proposed for listing as threatened or endangered under the Endangered Species Act (50 Code of Federal Regulations [CFR] 17.12 [listed plants] and various notices in the Federal Register [proposed species]).
- Candidates for possible future listing as threatened or endangered under the Endangered Species Act.
- Listed or candidates for listing by the State of California as threatened or endangered under the California Endangered Species Act (14 California Code of Regulations [CCR] 670.5).
- Listed as rare under the California Native Plant Protection Act (California Fish and Game Code [FGC] § 1900 *et seq.*).
- Ranked by CNPS as 1, 2, or to be rare, threatened, or endangered in California (CNPS Lists ranked 1B and 2B).

The CNPS and CNDDDB record searches found 19 special-status plant species that have been recorded within the general vicinity (approximately 5 miles) of the potential sites for rezoning (Exhibit 3.3-2 and Appendix D).^{17,18,19} Out of these 19 special-status plant species, one is federally listed (California seablite (*Suaeda californica*)); and one is federally and State listed (palmate-bracted bird’s-beak (*Chloropyron palmatum*)). The remaining 17 special-status plant species recorded throughout the area within 5 miles of the potential sites for rezoning consist of non-listed species. These species include, but are not limited to brittlescale (*Atriplex depressa*), lesser saltscale (*Atriplex minuscula*), Congdon’s tarplant (*Centromadia parryi ssp. congdonii*), San Joaquin spearscale (*Extriplex joaquinana*), Diablo helianthella (*Helianthella castanea*), prostrate vernal pool navarretia (*Navarretia prostrata*), hairless popcornflower (*Plagiobothrys glaber*), Oregon polemonium (*Polemonium carneum*), long-styled sand-spurrey (*Spergularia macrotheca var. longisty*), saline clover (*Trifolium hydrophilum*), and caper-fruited tropidocarpum (*Tropidocarpum capparideum*). Please see Appendix D for a comprehensive list of the 19 special-status plant species that have been recorded within approximately 5 miles of the potential sites for rezoning.

Special-status Wildlife

Special-status wildlife are animals that meet the definition of “endangered, rare, or threatened” under State CEQA Guidelines Section 15380. For the purposes of this Draft Program EIR, this includes all animal species that meet any of the following criteria:

¹⁷ United States Fish and Wildlife Service (USFWS). 2022. Information for Planning and Consultation. Website: <https://ecos.fws.gov/ipac/>. Accessed May 4, 2022.

¹⁸ California Department of Fish and Wildlife (CDFW). 2022. CNDDDB RareFind 5 California Natural Diversity Database Query for Special-Status Species. Website: <https://map.dfg.ca.gov/rarefind/view/RareFind.aspx>. Accessed May 4, 2022.

¹⁹ California Native Plant Society (CNPS). 2022. California Native Plant Society Rare and Endangered Plant Inventory. Website: <http://www.rareplants.cnps.org/>. Accessed May 4, 2022.

- Listed or proposed for listing as threatened or endangered under the Endangered Species Act (50 CFR 17.11 [listed animals] and various notices in the Federal Register [proposed species]).
- Candidates for possible future listing as threatened or endangered under the Endangered Species Act.
- Listed or candidates for listing by the State of California as threatened or endangered under the California Endangered Species Act (CESA) (14 CCR 670.5).
- Special protected by the federal Migratory Bird Treaty Act (16 United States Code [USC] 703-711).
- Species designated by the CDFW as Species of Special Concern.
- Species designated by the CDFW as Fully Protected.
- Otherwise protected under State or federal law.

A CNDDDB record search found 29 special-status wildlife species have been recorded within approximately 5 miles of the potential sites for rezoning (Exhibit 3.3-2 and Appendix D). 20,21 Out of these 29 special-status wildlife species, four are federally listed and include California red-legged frog (*Rana draytonii*), vernal pool fairy shrimp (*Branchinecta lynchi*), vernal pool tadpole shrimp (*Lepidurus packardii*), and steelhead (*Oncorhynchus mykiss irideus*); three are federally and State listed and include California tiger salamander (*Ambystoma californiense*), San Joaquin kit fox (*Vulpes macrotis mutica*) and Alameda whipsnake (*Masticophis lateralis euryxanthus*); three are State listed species and include foothill yellow-legged frog (*Rana boylei*), tricolored blackbird (*Agelaius tricolor*), California black rail (*Laterallus jamaicensis coturniculus*).

In addition, the remaining non-listed species are fully protected, or are Species of Special Concern under the California Fish and Game Code. These species include, but are not limited to, burrowing owl (*Athene cunicularia*), white-tailed kite (*Elanus leucurus*), Townsend's big-eared bat (*Corynorhinus townsendii*), San Francisco dusky-footed woodrat (*Neotoma fuscipes annectens*), and American badger (*Taxidea taxus*). Please see Appendix D for a comprehensive list of the 29 special-status wildlife species that have been recorded within an approximately 5-mile radius of the potential sites for rezoning.

Sensitive Natural Communities

Sensitive natural communities are vegetation communities or special wildlife habitats that are rare or occur in limited distributions or provide specific habitat requirements for special-status plant or wildlife species. The CDFW maintains a list of natural communities which attempts to classify vegetation types found within the State of California and rank them based on rarity. Communities ranked S1-S3 are considered sensitive natural communities.²² Sensitive natural communities within

²⁰ United States Fish and Wildlife Service (USFWS). 2022. Information for Planning and Consultation. Website: <https://ecos.fws.gov/ipac/>. Accessed May 4, 2022.

²¹ California Department of Fish and Wildlife (CDFW). 2022. CNDDDB RareFind 5 California Natural Diversity Database Query for Special-Status Species. Website: <https://map.dfg.ca.gov/rarefind/view/RareFind.aspx>. Accessed May 4, 2022.

²² California Department of Fish and Wildlife (CDFW). 2021. Natural Communities List, Sacramento: California Department of Fish and Wildlife. <https://wildlife.ca.gov/Data/VegCAMP/Natural-Communities>. Accessed May 4, 2022.

the Planning Area include, but are not limited to, riparian corridors (e.g., Arroyo Valle, Tassajara Creek) and wetlands.

Wetlands and Waters of the United States

Wetlands are habitats found in and along the edges of lakes (referred to as lacustrine habitat), arroyos and canals (riparian habitat), as well as springs and other ephemeral water sources. Wetlands are those areas that are inundated by water at a frequency and duration sufficient to support vegetation typically adapted for life in saturated soil conditions. Wetlands generally include swamps, marshes, bogs, and similar areas. Typical wetland vegetation in the Planning Area includes annual emergent species such as cattails, sedges, watercress, tules, and curly dock. Other species include rabbit's foot grass and water smartweed. Wetlands provide habitat for several wildlife species, including waterfowl and amphibians, such as salamanders.^{23,24}

Wildlife Movement Corridors

Wildlife movement corridors allow wild animals to move between suitable habitats that are disconnected by either natural barriers or human development. Fragmentation of natural habitats by rivers or mountains in combination with roads and urban areas can create "islands" for wildlife populations. These islands may not be sufficient habitats to allow population growth and can impact genetic and species diversity. Movement corridors are areas of suitable substrate for particular species that can safely be used to mix with other populations, increasing genetic exchange and access to resources. Waterways serve as corridors for fish and other aquatic animals, while natural land cover such as grasslands or forests provide corridors for mammals, birds, reptiles, and more.²⁵

3.3.3 - Regulatory Framework

Federal

Endangered Species Act of 1973

The United States Congress passed the Federal Endangered Species Act in 1973 to protect those species that are endangered or threatened with extinction. The Endangered Species Act is intended to operate in conjunction with the National Environmental Policy Act (NEPA) to help protect the ecosystems upon which endangered and threatened species depend.

The Endangered Species Act prohibits the "take" of endangered or threatened wildlife species. "Take" is defined to include harassing, harming, pursuing, hunting, shooting, wounding, killing, trapping, capturing, or collecting wildlife species or any attempt to engage in such conduct (16 USC § 1531 *et seq.*). "Harm" is further defined to include significant habitat modification or degradation that results in death or injury to listed species by significantly impairing behavioral patterns (50 CFR § 17.3). "Harass" is defined as actions that create the likelihood of injury to listed species to such an

²³ City of Pleasanton. 2009. Pleasanton General Plan 2005-2025 Environmental Impact Report. April.

²⁴ City of Pleasanton. 2011. Supplemental Environmental Impact Report Housing Element and Climate Action Plan General Plan Amendment and Rezonings. September.

²⁵ City of Pleasanton. 2011. Supplemental Environmental Impact Report Housing Element and Climate Action Plan General Plan Amendment and Rezonings. September.

extent as to significantly disrupt normal behavior patterns (50 CFR § 17.3). Actions that result in take can result in civil or criminal penalties.

The Endangered Species Act and the Clean Water Act (CWA) Section 404 guidelines prohibit issuance of wetland permits for projects that jeopardize continued existence of any endangered or threatened species, or result in destruction or adverse modification of habitat of such species. The United States Army Corps of Engineers (USACE) must consult with the USFWS and/or the National Marine Fisheries Service (NOAA Fisheries) when threatened or endangered species under their jurisdiction may be affected by a proposed project. In the context of the Housing Element Update, Endangered Species Act consultation would be initiated if development resulted in take of a threatened or endangered species or if issuance of a Section 404 permit or other federal agency action could result in take of an endangered species or adversely modify critical habitat of such a species.

Migratory Bird Treaty Act

The Migratory Bird Treaty Act (MBTA) implements international treaties between the United States and other nations devised to protect migratory birds, their parts, eggs, and nests from activities such as hunting, pursuing, capturing, killing, selling, and shipping, unless expressly authorized in the regulations or by permit. All migratory birds and their nests are protected from take and other impacts under the MBTA (16 United States Code [USC] § 703, *et seq.*).

Bald and Golden Eagle Protection Act

The golden eagle (*Aquila chrysaetos*) and bald eagle (*Haliaeetus leucocephalus*) are afforded additional protection under the Eagle Protection Act, amended in 1973 (16 USC § 669, *et seq.*) and the Bald and Golden Eagle Protection Act (16 USC §§ 668–668d).

Clean Water Act

Section 404

The USACE administers Section 404 of the federal CWA, which regulates the discharge of dredge and fill material into waters of the United States.

As of the date of this report, the United States Environmental Protection Agency (EPA) and USACE (hereafter the agencies) are in receipt of the U.S. District Court for the District of Arizona’s August 30, 2021, order vacating and remanding the Navigable Waters Protection Rule in the case of *Pascua Yaqui Tribe v. U.S. Environmental Protection Agency*. Considering this order, these agencies have halted implementation of the Navigable Waters Protection Rule and are interpreting “waters of the United States” consistent with the pre-2015 regulatory regime until further notice.²⁶

Therefore, since the agencies are interpreting “waters of the United States” consistent with the pre-2015 regulatory regime until further notice, the analysis included in this Draft Program EIR follows 40 Code of Federal Regulations 230.3(s), which defines “waters of the United States” as follows:

²⁶ United States Environmental Protection Agency (EPA). 2022. Current Implementation of Waters of the United States. Website: <https://www.epa.gov/wotus/current-implementation-waters-united-states>. Accessed May 13, 2022.

1. All waters which are currently used, or were used in the past, or may be susceptible to use in interstate or foreign commerce, including all waters which are subject to the ebb and flow of the tide.
2. All interstate waters including interstate wetlands.
3. All other waters such as intrastate lakes, rivers, streams (including intermittent streams), mudflats, sandflats, wetlands, sloughs, prairie potholes, wet meadows, playa lakes, or natural ponds, the use, degradation or destruction of which could affect interstate or foreign commerce including any such waters:
 - a) Which are or could be used by interstate or foreign travelers for recreational or other purposes; or
 - b) From which fish or shellfish are or could be taken and sold in interstate or foreign commerce; or
 - c) Which are used or could be used for industrial purposes by industries in interstate commerce.
4. All impoundments of waters otherwise defined as waters of the United States under this definition.
5. Tributaries of waters identified in paragraphs (s)(1) through (4) of this section.
6. The territorial sea.
7. Wetlands adjacent to waters (other than waters that are themselves wetlands) identified in paragraphs (s)(1) through (6) of this section; waste treatment systems, including treatment ponds or lagoons designed to meet the requirements of the CWA (other than cooling ponds as defined in 40 Code of Federal Regulations 423.11(m) which also meet the criteria of this definition) are not waters of the United States.

Waters of the United States do not include prior converted cropland. Notwithstanding the determination of an area's status as prior converted cropland by any other federal agency, for the purposes of the CWA, the final authority regarding CWA jurisdiction remains with the EPA and/or USACE.

“Wetland” refers to areas that are inundated or saturated by surface or groundwater at a frequency and duration sufficient to support, and that under normal circumstances do support, a prevalence of vegetation typically adapted for life in saturated soil conditions. Wetlands generally include swamps, marshes, bogs, and seasonal wetlands. Wetlands are considered jurisdictional if they fall under one of the categories of waters of the United States defined above. The USACE jurisdiction typically extends up to the ordinary high water mark (OHWM).

In general, a USACE permit must be obtained before placing fill in wetlands or other waters of the United States. The type of permit depends on the impacted acreage, the purpose of the proposed fill, and other factors.

Section 401

As stated in Section 401 of the CWA, “any applicant for a federal permit for activities that involve a discharge to waters of the State, shall provide the federal permitting agency a certification from the State in which the discharge is proposed that states that the discharge will comply with the applicable provisions under the Federal Clean Water Act.” Therefore, before the USACE will issue a valid Section 404 permit, applicants must obtain a Section 401 Water Quality Certification from the Regional Water Quality Control Board (RWQCB).

State

California Endangered Species Act

The State of California enacted CESA in 1984. CESA pertains to State listed endangered and threatened species. CESA requires State agencies to consult with the CDFW when preparing CEQA documents to ensure that the State lead agency actions do not jeopardize the continued existence of a listed species or result in the destruction or adverse modification of habitat essential to the continued existence of those species, if there are reasonable and prudent alternatives available (Fish and Game Code [FGC] § 2080). CESA directs agencies to consult with the CDFW on projects or actions that could affect listed species, directs the CDFW to determine whether jeopardy would occur, and allows the CDFW to identify “reasonable and prudent alternatives” to the project consistent with conserving the species. CESA allows the CDFW to authorize exceptions to the State’s prohibition against take of a listed species if the “take” of a listed species is incidental to carrying out an otherwise lawful project that has been approved under CEQA (FGC § 2081).

California Fish and Game Code

Under CESA, the CDFW has the responsibility for maintaining a list of endangered and threatened species (FGC § 2070). Fish and Game Code Sections 2050 through 2098 outline the protection provided to California’s rare, endangered, and threatened species. Fish and Game Code Section 2080 prohibits the taking of plants and animals listed under the CESA. Fish and Game Code Section 2081 established an incidental take permit program for State listed species. The CDFW maintains a list of “candidate species,” which it formally notices as being under review for addition to the list of endangered or threatened species.

In addition, the Native Plant Protection Act of 1977 (NPPA) (FGC § 1900, *et seq.*) prohibits the taking, possessing, or sale within the State of any plants with a State designation of rare, threatened, or endangered (as defined by the CDFW). An exception to this prohibition in the NPPA allows landowners to take listed plant species under specified circumstances, provided that the owners first notify the CDFW and give the agency at least 10 days to come and retrieve (and presumably replant) the plants before they are plowed under or otherwise destroyed. Fish and Game Code Section 1913 exempts from “take” prohibition “the removal of endangered or rare native plants from a canal, lateral ditch, building site, or road, or other right-of-way.” Project impacts to these species are not considered significant unless the species are known to have a high potential to occur within the area of disturbance associated with construction of a proposed project.

In addition to formal listing under the Endangered Species Act and CESA, some species receive additional consideration by the CDFW and local lead agencies during the CEQA process. Species that

may be considered for review are those listed as a “Species of Special Concern.” The CDFW maintains lists of “Species of Special Concern” that serve as species “watch lists.” Species with this status may have limited distributions or limited populations, and/or the extent of their habitats has been reduced substantially, such that their populations may be threatened. Thus, their populations are monitored, and they may receive special attention during environmental review. While they do not have statutory protection, they may be considered rare under CEQA and specific protection measures may be warranted. In addition to Species of Special Concern, the CDFW Special Animals List identifies animals that are tracked by the CNDDDB and may be potentially vulnerable but warrant no federal interest and no legal protection.

Sensitive species that would qualify for listing but are not currently listed are afforded protection under CEQA. State CEQA Guidelines Section 15065 (Mandatory Findings of Significance) requires that a substantial reduction in numbers of a rare or endangered species be considered a significant effect. State CEQA Guidelines Section 15380 (Rare or Endangered Species) provides for the assessment of unlisted species as rare or endangered under CEQA if the species can be shown to meet the criteria for listing. Unlisted plant species on the CNPS List ranked 1A, 1B, and 2 would typically require evaluation under CEQA.

Fish and Game Code Sections 3500 to 5500 outline protection for fully protected species of mammals, birds, reptiles, amphibians, and fish. Species that are fully protected by these sections may not be taken or possessed at any time. The CDFW cannot issue permits or licenses that authorize the take of any fully protected species, except under certain circumstances such as scientific research and live capture and relocation of such species pursuant to a permit for the protection of livestock.

Under Fish and Game Code Section 3503.5, it is unlawful to take, possess, or destroy any birds in the orders of *Falconiformes* or *Strigiformes* (birds of prey) or to take, possess, or destroy the nest or eggs of any such bird except as otherwise provided by this code or any regulation adopted pursuant thereto. To comply with the requirements of CESA, an agency reviewing a proposed project within its jurisdiction must determine whether any State listed endangered or threatened species may be present in the project study area and determine whether a proposed project will have a potentially significant impact on such species. In addition, the CDFW encourages informal consultation on any proposed project that may impact a candidate species.

Project-related impacts to species on the CESA endangered or threatened list would be considered significant. State listed species are fully protected under the mandates of CESA. “Take” of protected species incidental to otherwise lawful management activities may be authorized under Fish and Game Code Section 206.591. Authorization from the CDFW would be in the form of an Incidental Take Permit.

Fish and Game Code Section 1602 requires any entity to notify the CDFW before beginning any activity that “may substantially divert or obstruct the natural flow of, or substantially change or use any material from the bed, channel, or bank of any river, stream, or lake” or “deposit debris, waste, or other materials that could pass into any river, stream, or lake.” “River, stream, or lake” includes

waters that are episodic and perennial and ephemeral streams, desert washes, and watercourses with a subsurface flow.

California Department of Fish and Wildlife Species of Concern

In addition to formal listing under the Endangered Species Act and CESA, species receive additional consideration by the CDFW and local lead agencies during the CEQA process. Species that may be considered for review are included on a list of “Species of Special Concern” developed by the CDFW, which tracks species in California whose numbers, reproductive success, or habitat may be threatened. In addition to Species of Special Concern, the CDFW identifies animals that are tracked by the CNDDDB but warrant no federal interest and no legal protection. These species are identified as California Special Animals.

Porter-Cologne Water Quality Control Act

The CDFW is a trustee agency that has jurisdiction under Fish and Game Code Section 1600, *et seq.* Under Fish and Game Codes Sections 1602 and 1603, a private party must notify the CDFW if a proposed project would “substantially divert or obstruct the natural flow or substantially change the bed, channel, or bank of any river, stream, or lake designated by the department, or use any material from the streambeds . . . except when the department has been notified pursuant to Section 1601.” Additionally, the CDFW may assert jurisdiction over native riparian habitat adjacent to aquatic features, including native trees over 4 inches in diameter at breast height (DBH). If an existing fish or wildlife resource may be substantially adversely affected by the activity, the CDFW may propose reasonable measures that will allow protection of those resources. If these measures are agreeable to the parties involved, they may enter into an agreement with the CDFW identifying the approved activities and associated mitigation measures.

Section 13260(a) of the Porter-Cologne Water Quality Control Act (contained in the California Water Code) requires any person discharging waste or proposing to discharge waste, other than to a community sewer system, within any region that could affect the quality of the waters of the State (all surface and subsurface waters) to file a report of waste discharge. The discharge of dredged or fill material may constitute a discharge of waste that could affect the quality of waters of the State.

Historically, California relied on its authority under Section 401 of the CWA to regulate discharges of dredged or fill material to California waters, which requires an applicant to obtain “water quality certification” from the California State Water Resources Control Board (State Water Board) through its nine RWQCBs to ensure compliance with State water quality standards before certain federal licenses or permits may be issued. The permits subject to Section 401 include permits for the discharge of dredged or fill material (CWA Section 404 permits) issued by the USACE. Waste discharge requirements under the Porter-Cologne Water Quality Control Act were typically waived for projects that required certification. With recent changes that limited jurisdiction of wetlands under the CWA, the State Water Board has needed to rely on the report of the waste discharge process.

Oak Woodlands Conservation Act

California Senate Bill (SB) 1334, the Oak Woodlands Conservation Act, became law on January 1, 2005, and was added to the CEQA statute as Section 21083.4 of the Public Resource Code. This statute requires that a county must determine whether or not a project will result in a significant impact on oak woodlands and, if it is determined that a project may result in a significant impact on oak woodlands then the County shall require one or more of the following mitigation measures:

- Conserve oak woodlands through the use of conservation easements;
- Plant an appropriate number of trees, including maintenance of plantings and replacement of failed plantings;
- Contribute funds to the Oak Woodlands Conservation Fund for the purpose of purchasing oak woodlands conservation easements; or
- Other mitigation measures developed by the county.

California Native Plant Society

The CNPS maintains a rank of plant species that are native to California and that have low population numbers, limited distribution, or are otherwise threatened with extinction. This information is published in the Inventory of Rare and Endangered Vascular Plants of California. Following are the definitions of the CNPS ranks:

- **Rank 1A:** Plants presumed extirpated in California and either rare or extinct elsewhere
- **Rank 1B:** Plants rare, threatened, or endangered in California and elsewhere
- **Rank 2A:** Plants presumed extirpated in California but common elsewhere
- **Rank 2B:** Plants rare, threatened, or endangered in California but more common elsewhere
- **Rank 3:** Plants about which more information is needed, a review list
- **Rank 4:** Watch List: Plants of limited distribution

All plants appearing on CNPS List ranked 1 or 2 are considered to meet State CEQA Guidelines Section 15380 criteria. While only some of the plants ranked 3 and 4 meet the definitions of threatened or endangered species, the CNPS recommends that all Rank 3 and Rank 4 plants be evaluated for consideration under CEQA.

Regional

Habitat Conservation Plan

East Alameda County Conservation Strategy

The East Alameda County Conservation Strategy (EACCS) intends to provide an effective framework to protect, enhance, and restore natural resources in eastern Alameda County, while improving and streamlining the environmental permitting process for impacts resulting from infrastructure and development projects. The City of Pleasanton is a partner in the EACCS and uses the document to provide a baseline inventory of biological resources and conservation priorities during project-level planning and environmental permitting. The EACCS is a framework for guidance by regulatory agencies and does not include incidental take permits for threatened or endangered species similar

to those provided by a Habitat Conservation Plan (HCP). Compliance with the EACCS is voluntary but doing so streamlines the regulatory permitting process.

The potential sites for rezoning are all located within Conservation Zone 2 of the EACCS, which recognizes this area as highly developed while still providing pockets of habitat for several special-status species. The EACCS describes the following conservation priorities for Conservation Zone 2:

- Protection of burrowing owl nesting and foraging habitat.
- Protection of and restoration opportunities in mixed willow riparian scrub along Arroyo del Valle and Arroyo Mocho.
- Protection of and restoration opportunities along Arroyo Seco and Arroyo Mocho to support California red-legged frog and future central California coast steelhead habitat.
- Surveys for San Joaquin spearscale and protection of extant populations.
- Surveys for Congdon's tarplant and protection of extant populations.
- Protection of vernal pool habitat.

Local

City of Pleasanton

City of Pleasanton General Plan

Biological resources related goals, policies, and programs of the General Plan serve to guide the location, design, and quality of development to protect protected wildlife, plants, and their associated habitats. The relevant goals, policies, and programs are provided below.

Conservation and Open Space Element

Goal 1 Practice sustainability to preserve and protect natural resources and open space.

Natural Resources

Goal 2 Preserve and enhance the natural resources of the Planning Area, including plant and wildlife habitats, Heritage Trees, scenic resources, and watercourses.

Policy 1 Preserve and enhance natural wildlife habitats and wildlife corridors.

Program 1.1 Complete a comprehensive study of the ecosystems and wildlife habitat areas within and around the Planning Area, and develop and implement ordinances and policies that will provide for their preservation and enhancement.

Program 1.2 Identify land within the Planning Area which could be reclaimed as viable wildlife habitat. Study methods to re-establish viable plant and animal communities in these areas. Develop standards to accomplish habitat reclamation which: (1) specify the minimum acreage, topography, flora, fauna, and other characteristics necessary to ensure survival of wildlife habitat areas; (2) specify necessary length, breadth, flora, fauna, and other characteristics necessary to ensure the protection and use of wildlife corridors; and (3) prevent the creation of open space islands, unless they are

connected through a series of viable wildlife corridors in accordance with specified standards.

- Program 1.3** Preserve and enhance the resource value of wetlands through project development design measures. These measures should be based in part on jurisdictional wetlands delineation in accordance with current Army Corps of Engineers criteria, for projects which are known to have or that may have wetlands present within their boundaries.
- Program 1.4** Develop and implement ordinances and policies that provide for the preservation of wildlife corridors and establish mitigation requirements which minimize the barriers across wildlife corridors that roadways and developments can create.
- Program 1.5** Investigate existing private, State, and federal incentive programs and develop City incentive programs that encourage property owners to cooperate in the preservation and restoration of wildlife habitat.
- Program 1.6** Analyze potential impacts on wildlife populations and habitats before developing projects, using the California Environmental Quality Act (CEQA) process or other processes, as relevant.
- Program 1.7** Minimize active recreation – sports, games, exercising, and fishing – within natural habitat areas. Permit passive recreation such as hiking, bicycling, horseback riding, nature and cultural resource study, photography, and picnicking.
- Program 1.8** Design site sensitive recreation or interpretive facilities to minimize intrusion within natural public open space. Limit public access, including hiking trails, into sensitive habitat area, when warranted.
- Program 1.9** Plant native species wherever possible in public and private landscaping, and provide wildlife habitat in new landscaping, where appropriate.
- Program 1.10** Design storm retention and drainage ponds, groundwater-recharge areas, and watercourses as wildlife habitats, when appropriate and environmentally sound.
- Program 1.11** Support the efforts of the Alameda Creek Fisheries Restoration Workgroup to restore native steelhead populations in Alameda Creek.
- Program 1.12** Support appropriate development intensity adjacent to areas designated as Wildland Overlay.
- Policy 2** Preserve Heritage Trees throughout the Planning Area.
- Program 2.1** Strongly encourage preservation of Heritage Trees; where preservation is not feasible, the City will require tree replacement or a contribution to the Urban Forestry Fund. Allow no net loss of trees.

Program 2.2 Follow the provisions of the City’s Heritage Tree Ordinance, Pleasanton Municipal Code Chapter 17.16, Tree Preservation, when reviewing future development projects.

Policy 3 Preserve and enhance streambeds and channels in a natural state.

Open Space

Goal 5 Preserve and protect existing and proposed open space lands for public health and safety, recreational opportunities, natural resources (e.g., agriculture, sand and gravel mining), sensitive viewsheds, and biological resources.

Policy 6 Protect all large continuous areas of open space, as designated on the General Plan Map, from intrusion by urban development.

Program 6.1 Explore working with the Tri-Valley Conservancy or similar entities to use transfer of development rights and conservation easements to preserve open space.

Program 6.2 Establish appropriate levels for the development of land adjacent to areas designated as Wildland Overlay through studies which indicate the types of development posing the least potential negative impact on wildlife habitat.

Program 6.3 Preserve large blocks of open space land by encouraging the clustering of development.

Program 6.4 Investigate methods and pursue opportunities to retain areas designated on the General Plan Map as Open Space for permanent open space use through acquisition, conservation easements, establishment of land trusts, etc.

Program 6.6 Encourage developers to publicly dedicate fee title to open space lands: (1) that are determined to have considerable public recreational, scenic, or natural resource value; (2) where operational costs can be met; and (3) where significant potential health or safety hazards do not exist. Developers should offer public access to the fullest extent possible.

Program 6.7 Develop zoning districts with open space uses appropriate for the adopted Open Space categories listed on the General Plan Map and that implement the policies and programs of the General Plan.

Program 6.8 Continue to restrict private development in areas designated as Public Health and Safety and Wildland Overlay to a single-family home on existing lots of record as of September 16, 1986.

Open Space Parks and Recreation

Goal 6 Achieve an extensive open space system featuring a wide variety of opportunities to serve the diverse needs of the public.

- Policy 7** Preserve and expand open space opportunities, including open space access to the public.
- Program 7.1** Support expansion of the East Bay Regional Park District’s Pleasanton Ridge Park in areas designated as Open Space.
- Program 7.2** Work cooperatively with Alameda County, the City of Hayward, and the East Bay Regional Park District to retain Pleasanton Ridge as a permanent open space lands.
- Program 7.3** Encourage public accessibility to appropriate public open space land or in private open space land that could accommodate public access open space trails.
- Program 7.4** Provide adequate parking and staging areas for open space access and include facilities such as picnic areas, restrooms, and potable water.
- Goal 7** Promote expansion and maintenance of a trail system that serves Pleasanton’s diverse population while respecting and protecting the integrity of its natural and cultural resources.
- Policy 9** Promote the development of a comprehensive system of pedestrian, bicycle, equestrian, and hiking trails throughout open space lands, including arroyos and canals, in the Planning Area
- Program 9.2** Require developers to dedicate public access easements for trails in private open space areas, where feasible
- Program 9.6** Continue to provide different trail types for a variety of uses: hikers, walkers, joggers, cyclists, and equestrians.
- Program 9.7** Protect, improve, develop, and maintain recreation and open space trails and their related facilities.
- Program 9.9** Wherever feasible, require new development within or adjacent to the Pleasanton Ridglands area to provide public access and/or public staging areas to connect with the Pleasanton Ridge Park.
- Water Element**
- Goal 2** Provide healthy water courses, riparian functions, and wetlands for humans, wildlife, and plants.
- Policy 2** Preserve and enhance streambeds and channels in a natural state.
- Program 2.1** Develop and implement ordinances and policies that provide for the preservation and restoration of riparian functions, and establish mitigation requirements for modifications to riparian corridors.

- Program 2.2** Develop policies and standards in cooperation with Zone 7 that include restoring riparian corridors when flood and erosion control activities require channelization.
- Program 2.3** Utilize habitat preservation and reclamation measures when designing flood and erosion control projects to limit impacts on plants and wildlife.
- Program 2.4** Design projects adjacent to the arroyos to protect habitat areas.
- Program 2.5** Work with Zone 7 Water Agency to restore arroyos consistent with its Stream Management Master Plan.
- Program 2.6** Work with Zone 7 Water Agency to provide information to the public regarding the importance of healthy arroyos.
- Program 2.7** Locate wetland buffers between a wetland and proposed, existing, or potential development. These buffers should be of sufficient width and size to protect species most sensitive to development and should be designed to complement the habitat value of the wetland resource.
- Program 2.8** Require that future developments result in no net loss of wetlands.
- Goal 3** Ensure a high level of water quality and quantity at a reasonable cost and improve water quality through production and conservation practices which do not negatively impact the environment.
- Policy 3** Protect the quality and quantity of surface water and groundwater resources in the Planning Area.
- Program 3.11** Support Zone 7 in implementing its Stream Management Master Plan so as to protect and enhance the water quality of streams and groundwater.
- Program 3.12** Conserve Pleasanton’s urban forest, including trees in parks and on private property as well as street trees, so as to continue and enhance surface water filtration and community character. Pervious ground surfaces and the trees’ root systems help in the filtration of surface water below the ground level.
- Goal 7** Reduce stormwater runoff and maximize infiltration of naturally occurring rainwater so as to improve surface and subsurface water quality.
- Policy 10** Encourage a built environment that minimizes impervious surfaces.
- Policy 11** Implement stormwater runoff requirements, as required by the State Regional Water Quality Control Board and the Alameda County-wide Clean Water Program, with as little impact on development and business costs as possible.

Housing Element

The Housing Element is the primary tool used by the State to ensure local governments are appropriately planning for and accommodating enough housing across all income levels for the planning period 2023-2031. Goals, policies, and programs regarding biological resources in the Housing Element Update are provided in Chapter 2, Project Description, specifically, Goal 6 and Policy 6.1 provide guidance for biological resources.

Vineyard Avenue Corridor Specific Plan

The Vineyard Avenue Corridor Specific Plan includes the 384-acre area along Vineyard Avenue in southeast Pleasanton. The Vineyard Avenue Corridor Specific Plan establishes a unique environment which includes a variety of agricultural, residential, open space, recreational, educational, and other uses. Objectives, policies, and guidelines regarding biological resources are listed below. In case of inconsistency between the Vineyard Avenue Corridor Specific Plan and the Municipal Code, the more stringent regulations govern.

Environmental Objectives:

- Protect special-status plant and wildlife species.
- Permanently preserve significant woodland, riparian habitat areas, wetlands, and wildlife corridors.
- Preserve and protect existing Heritage Trees, wherever possible.

Wetlands

- The wetlands identified for development in the Specific Plan include the northern portion of the central drainage from the existing alignment of Vineyard Avenue to Arroyo del Valle to accommodate the proposed residential development on Lot²⁷ 18 and the school on Lot 19, a 300-foot section of the drainage on Lots 19, 20, and 27 south of the existing alignment of Vineyard Avenue to accommodate residential development on Lot 27, and a 60-foot section of the drainage of Lots 19, 20, and 27 near the Plan Area's northern boundary at Lot 19 to accommodate the realigned Vineyard Avenue crossing.
- Measures to minimize erosion and runoff into seasonal drainages shall also be included in all grading plans. Appropriate runoff controls such as berms, storm gates, detention basins, overflow collection areas, filtration systems, and sediment traps shall be implemented to control siltation and the potential discharge of pollutants into preserved drainages.
- Prior to the issuance of grading permits for Lots 18, 19, 21, 22, 24, 26, 27, 28, 32, and 33, a qualified Biologist shall determine, through the formal Section 404 wetlands delineation process, the extent of jurisdictional wetlands on each lot. Authorization of a Section 404 permit shall be secured from USACE, and a Section 1603 agreement shall be secured from CDFW, if applicable. As part of the permitting process, mitigation of impacts to jurisdictional wetlands shall be identified and implemented. The acreage shall be replaced or rehabilitated

²⁷ The lot numbers correspond to the numbers included in the Vineyard Avenue Corridor Specific Plan. Only one Site, Site 27, is within the Vineyard Avenue Corridor Specific Plan area, and it is Lot 19 within that specific plan.

on a “no net loss” basis in accordance with USACE regulations. Habitat restoration, rehabilitation, and/or replacement shall be at a location and by methods agreeable to USACE.

Wildlife

- In an effort to protect potential red-legged frog species in the Plan Area, all grading plans shall include a minimum 100-foot setback from seasonal ponds that are not identified for development in the Specific Plan. The above wetlands requirements identify all wetlands that would be disturbed by site development, and Exhibit 4.4-1 of the Draft Environmental Impact Report prepared for the Vineyard Avenue Corridor Specific Plan identifies intermittent drainages and other seasonal wetlands. Construction activity occurring within 100 feet of an intermittent drainage may occur only if the drainage is completely dry.
- All grading plans will include a minimum 100-foot setback from suitable California tiger salamander breeding habitat (i.e., seasonal pond) that is not identified for development in the Specific Plan. The above wetlands requirements identify all wetlands that would be disturbed by site development, and Exhibit 4.4-1 of the Draft Environmental Impact Report prepared for the Vineyard Avenue Corridor Specific Plan identifies intermittent drainages and other seasonal wetlands. For the upland habitat of the California tiger salamander that would be removed with the development of the Housing Element Update, an equivalent amount of upland habitat area shall be preserved within the Plan Area. Suitable tiger salamander habitat in the Plan Area includes all areas identified as blue oak woodland or annual grassland. The preserved habitat shall consist entirely of blue oak woodland or annual grassland habitat. All preserved habitat shall be managed and protected, in perpetuity, as natural habitat.
- To protect the riparian habitat associated with the Arroyo del Valle, a 100-foot setback shall generally be established from the top of the south bank of the Arroyo del Valle.²⁸ No development or construction activities other than detention basins and trails shall be allowed within the setback area. The trails shall be set back as far as possible from Arroyo del Valle to minimize disturbance by people and maximize habitat values. Construction project fencing shall be placed at the outer edge of the setback area. The fencing shall be maintained until all construction activities are completed. The setback requirements for trails shall also apply to other riparian corridors within the Specific Plan Area.
- When grading of an area of 1 acre or greater is to occur, or when one or more trees with a trunk diameter of 6 inches or greater are proposed to be removed during raptor nesting season (February 1 to August 31), a focused survey for raptor nests shall be conducted by a qualified Biologist during the nesting season. The survey shall be conducted no less than 14 days and no more than 30 days prior to the beginning of grading or tree removal. If nesting raptors are found during the focused survey, no grading or tree removal shall occur within 500 feet of an active nest until the young have fledged (as determined by a qualified Biologist), or until the project applicant receives written authorization from CDFW to proceed. If the removal of nest trees is unavoidable, they shall be removed during the nonbreeding season.

²⁸ The area directly to the north of the Arroyo del Valle is outside of the Urban Growth Boundary, and therefore no future development is anticipated in that area. For that reason, the Vineyard Avenue Corridor Specific Plan only includes a setback for the south bank of the Arroyo del Valle and no setback is included for north bank.

- All future bridges over creeks shall be designed to preserve wildlife corridors between the greater Plan Area and the Arroyo del Valle.

Hacienda PUD Development Plan Design Guidelines

The Hacienda Planned Unit Development (PUD) area is generally located south of Interstate 580 (I-580), west of Tassajara Creek, north of W. Las Positas Boulevard, and east of Hopyard Road. The Hacienda PUD Development Plan Design Guidelines (Hacienda Design Guidelines) ensure that development within the Hacienda PUD area is within the best interests of the public's health, safety, and general welfare, is consistent with the General Plan, compatible with existing developed properties, presents a positive image for the city along the I-580 frontage, and development within the Hacienda PUD area conform to the purpose of the PUD. Parcel 5D corresponds to Site 5 (Laborer Council), Parcel 9 corresponds to Site 7 (Hacienda Terrace), Parcel 18B to Site 8 (Muslim Community Center), Parcel 58C to Site 9 (Metro 580), and Parcel 56C corresponds to Site 29 (Oracle).

Section 3.6 includes planting guidelines and 3.6(B) provides regulations with respect to tree preservation, protection, and removal.

Pleasanton Municipal Code

City of Pleasanton Tree Preservation Ordinance

Chapter 17.16 of the Municipal Code regulates the removal and preservation of Heritage Trees within the city. A Heritage Tree is any tree of any species or origin which meets the specific criteria specified below.

- Any single-trunked tree with a circumference of 55 inches or more measured four and one-half feet above ground level;
- Any multi-trunked tree of which the two largest trunks have a circumference of 55 inches or more measured four and one-half feet above ground level;
- Any tree 35 feet or more in height;
- Any tree of particular historical significance specifically designated by official action;
- A stand of trees, the nature of which makes each dependent upon the other for survival or the area's natural beauty.

3.3.4 - Project Impacts and Mitigation Measures

Significance Criteria

The City is using Appendix G of the State CEQA Guidelines as thresholds of significance for the Housing Element Update. To determine whether impacts related to biological resources are significant environmental effects, the following questions are analyzed and evaluated. Would the Housing Element Update:

- a) Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special-status species in local or regional plans,

- policies, or regulations, or by the California Department of Fish and Wildlife or United States Fish and Wildlife Service?
- b) Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, and regulations or by the California Department of Fish and Wildlife or United States Fish and Wildlife Service?
 - c) Have a substantial adverse effect on State or federally protected wetlands (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means?
 - d) Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of wildlife nursery sites?
 - e) Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?
 - f) Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or State Habitat Conservation Plan?

As part of the mandatory findings of significance, Appendix G of the State CEQA Guidelines requires a lead agency to determine whether a project may have a significant effect on the environment. With respect to biological resources, to determine whether impacts related to biological resources are significant environmental effects, the following questions are analyzed and evaluated. Would the Housing Element Update:

- a) Substantially reduce the habitat of a fish or wildlife species?
- b) Cause a fish or wildlife population to drop below self-sustaining levels?
- c) Threaten to eliminate a plant or animal community?
- d) Substantially reduce the number or restrict the range of an endangered, rare or threatened species?

Approach to Analysis

FCS Biologists examined existing environmental documentation for the potential sites for rezoning and their general vicinity. This documentation included a desktop level review (programmatic) of the General Plan, City of Pleasanton General Plan 2005-2025 EIR, Vineyard Avenue Corridor Specific Plan, Hacienda Design Guidelines, the Municipal Code, 2015-2023 (5th Cycle) Housing Element Draft Supplemental Environmental Impact Report (State Clearinghouse [SCH] No. 2011052002), final draft of the EACCS, and federal and State register listings, protocols, and species data provided by the USFWS, CNPS, and the CDFW. A list of special-status species that have the potential to occur within the potential sites for rezoning was prepared (Appendix D). Additionally, the analysis provided a review of General Plan goals, policies, and programs and if they would reduce potential impacts to less than significant levels.

Biological resource impacts associated with the development on the Dublin-Pleasanton Bay Area Rapid Transit (BART) station property were fully evaluated in the 2015-2023 (5th Cycle) Housing Element Draft Supplemental Environmental Impact Report (State Clearinghouse No. 2011052002), and no additional impacts to biological resources are associated with the implementation of the Housing Element Update on the Dublin-Pleasanton BART station property; therefore, this analysis does not include that site.

Impact Evaluation

Special-status Species

Impact BIO-1: Development consistent with the Housing Element Update, rezonings, General Plan and Specific Plan Amendments could have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special-status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or United States Fish and Wildlife Service.

As cited in the Environmental Setting section, 19 special-status plant species and 29 special-status wildlife species occurred within approximately 5 miles of the potential sites for rezoning. The habitats these sensitive plant species are usually located in (chaparral, serpentine soils, riparian woodland, marshes, or swamps) are not generally found within the potential sites for rezoning (see Exhibit 3.3-1). Similarly, the potential sites for rezoning do not generally contain habitat that would support most sensitive wildlife species. Rather, sensitive wildlife species would most likely be found in the surrounding undeveloped hillsides present in the Planning Area (e.g., potential oak woodland habitat that could occur within Site 1). Wildlife species adapted to urban environments, such as birds and bats, may find suitable nesting habitat in urbanized areas within buildings and other human-made structures where most of the rezoning is proposed.

A majority of Pleasanton is built out, and rezoning would primarily occur on infill parcels that have been previously developed (Exhibit 2-2 in Chapter 2, Project Description and Exhibit 3.3-1). However, Sites 1 (Lester), 3 (PUSD-Donlon), 14 (St. Elizabeth Seton), 21a and b (Kiewit), 22 (Merritt), 26 (St. Augustine), 27 (PUSD-Vineyard), 29 (Oracle) and portions of Site 24 (Sonoma Drive) are vacant. Therefore, subsequent development consistent with the Housing Element Update could result in the direct/indirect loss or indirect disturbance of special-status plant or animal species or their habitats.

Though the likelihood of encountering special-status species on the potential sites for rezoning is low given the built-out nature of the majority of the sites, significant impacts on special-status plant species associated with individual subsequent projects consistent with the Housing Element Update could include the direct loss of individual plants and of habitat areas associated with these special-status plant species. Indirect impacts to special-status plant species could include habitat degradation because of impacts to water quantity and quality.

Significant impacts on special-status wildlife species associated with development of the potential sites for rezoning include, but are not limited to, the following:

- Direct mortality from the collapse of underground burrows, resulting from soil compaction.

- Direct mortality resulting from removal of trees with active nests.
- Direct mortality or loss of suitable habitat resulting from the trimming or removal of obligate host plants.
- Direct mortality resulting from the filling of wetlands features.
- Loss of breeding and foraging habitat resulting from the filling of seasonal or perennial wetlands.
- Loss of breeding, foraging, and refuge habitat resulting from the permanent removal of riparian vegetation.
- Loss of suitable habitat for vernal pool invertebrates resulting from the destruction or degradation of vernal pools or seasonal wetlands.
- Abandonment of eggs or young and subsequent nest failure for special-status nesting birds, including raptors, and other non-special-status migratory birds resulting from construction-related noises.
- Loss of suitable foraging habitat for special-status raptor species.
- Loss of migration corridors resulting from the construction of permanent structures or features.

The General Plan includes policies and programs specifically designed to address potential impacts on special-status species. Chapter 7, Conservation and Open Space Element of the General Plan, Policy 1 requires the preservation and enhancement of natural wildlife habitats and wildlife corridors and Programs 1.1- 1.6 provide policy-based mitigation for special-status species. Program 1.1 requires the completion of a comprehensive study of the ecosystems and habitat areas within the Planning Area. Program 1.2 requires the identification of land within the Planning Area which could be reclaimed as viable wildlife habitat, study methods to re-establish viable plant and animal communities in these areas and development of standards to accomplish habitat reclamation to ensure the protection and use of wildlife corridors. Program 1.3 helps to preserve wetlands through project development design measures. Program 1.4 outlines measures to preserve wildlife corridors and establish mitigation requirements which minimize the barriers across wildlife corridors. Program 1.5 requires investigation of existing incentive programs that encourage property owners to cooperate in the preservation and restoration of wildlife habitat. Program 1.6 requires the analysis of potential impacts on wildlife populations and habitats before developing projects, using the CEQA process or other processes, as relevant. Policy 2 requires the preservation of Heritage Trees, and Programs 2.1 and 2.2 provide additional policy-based mitigations for special-status species and their habitats. Program 2.1 strongly encourages preservation of Heritage Trees, and, where preservation is not feasible, the City would require tree replacement or a contribution to the Urban Forestry Fund. This program allows no net loss of trees. Program 2.2 requires adherence to the provisions of the City's Heritage Tree Ordinance, Pleasanton Municipal Code Chapter 17.16, Tree Preservation, when reviewing future development projects.

With respect to Site 27 (PUSD-Vineyard) and the Vineyard Avenue Corridor Specific Plan, several policies and programs are in place for special-status species as noted in Section 3.3.3 above. In

compliance with the Vineyard Avenue Corridor Specific Plan, all grading plans are required to include a 100-foot setback from seasonal ponds to avoid impacts to red-legged frogs and California tiger salamander (CTS) breeding habitat, if applicable. Any potential upland habitat of CTS (blue oak woodland or annual grassland) removed would be mitigated on-site at a 1:1 ratio, if applicable. If any trees are to be removed during raptor nesting season, a focused survey by a qualified Biologist shall be conducted no more than 14 days, and no less than 30 days, prior to removal, if applicable.

Additionally, special-status species receive protection from various federal and State laws and regulations, including the Endangered Species Act and CESA. The USFWS generally requires a permit under Section 10 of the Endangered Species Act for incidental take of federally listed species from development activities. Additionally, the CDFW generally requires a CESA Section 2081(b) permit for incidental take of State listed species from development activities. Compliance with the federal and State endangered species acts, as well as implementation of the General Plan goals, policies, and programs discussed previously would reduce potential direct and indirect impacts on special-status species within the potential sites for rezoning. Nonetheless, the potential for impacts to special-status species, migratory birds, or nesting birds remains potentially significant.

On sites (e.g., Site 1, Lester) where potential special-status species, migratory birds, or nesting birds are likely to be present (to be determined by a qualified Biologist), Mitigation Measure (MM) BIO-1 requires, prior to the issuance of grading permits, a qualified Biologist to prepare a project-specific Biological Resources Analysis, consisting of a project-specific analysis of potential impacts on all biological resources, including impacts on special-status species and their habitat, migratory birds and other protected nesting birds, roosting bats, rare plants, sensitive communities, protected waters and wetlands, wildlife corridors and nursery sites.

Therefore, with regulatory compliance and implementation of MM BIO-1, development consistent with the Housing Element Update would not result in significant adverse effects to special-status species and impacts would be less than significant.

Level of Significance Before Mitigation

Potentially significant impact.

Mitigation Measures

MM BIO-1 Biological Resource Assessment

Prior to the issuance of entitlements for a project, applicants or sponsors of projects on sites where potential special-status species, migratory birds, or nesting birds are present (to be determined by a qualified Biologist) shall retain a qualified Biologist/Wetland Regulatory Specialist to prepare a Biological Resource Assessment (BRA).

The BRA shall include a project-specific analysis of potential impacts on all biological resources, including impacts on special-status species and their habitat, migratory birds and other protected nesting birds, roosting bats, rare plants, sensitive communities, protected waters and wetlands (analyze project-specific compliance

with Clean Water Act [CWA], Porter-Cologne Water Quality Act, and Fish and Game Code), wildlife corridors and nursery sites. The BRA shall develop and define prescriptive and site-specific measures reducing potential impacts to a less than significant level. These measures shall be included as conditions of approval for building and grading permits issues for demolition and construction. If a water feature is found to be jurisdictional or potentially jurisdictional, the applicant shall comply with the appropriate permitting process with each agency claiming jurisdiction prior to disturbance of the feature.

The project applicant or sponsor shall ensure that, if development of habitat occupied by special-status species, migratory or nesting birds must occur as determined by a qualified Biologist/Wetland Regulatory Specialist, species impacts shall be avoided or minimized, and, if required by a regulatory agency or the CEQA process, loss of wildlife habitat or individual plants shall be fully compensated on a site. If on-site mitigation is not feasible in the City's discretion, it shall occur within the City of Pleasanton Planning Area whenever possible, with a priority given to existing habitat mitigation banks. Habitat mitigation shall be accompanied by a long-term management plan and monitoring program prepared by a qualified Biologist and include provisions for protection of mitigation lands in perpetuity through the establishment of easements and adequate funding for maintenance and monitoring; the time frame for the funding shall be detailed in the long-term management plan and monitoring program completed prior to disturbance of occupied habitat or water feature.

Level of Significance After Mitigation

Less than significant impact with mitigation incorporated.

Sensitive Natural Communities or Riparian Habitat

Impact BIO-2: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments could have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, and regulations or by the California Department of Fish and Wildlife or United States Fish and Wildlife Service.

As discussed in the Environmental Setting section, the Planning Area is likely to contain sensitive communities (e.g., oak woodlands and riparian habitat). Based on the generalized habitats presented in Exhibit 3.3-1 and noted in Impact BIO-1 above, Site 1 (Lester) may contain undisturbed oak woodland habitat. This community has the potential to provide habitat for many special-status species. Development consistent with the Housing Element Update could result in direct or indirect effects on riparian habitat and other sensitive communities because of project construction.

Some sensitive natural communities (e.g., wetlands and riparian habitat) and aquatic habitats qualify as protected wetlands or jurisdictional waters and are regulated through the CWA (see Impact BIO-3 for further discussion). Riparian habitats and sensitive natural communities receive protection under the California Fish and Game Code (FGC §§ 1601–1603). Any proposed activities that would divert or

obstruct the natural flow or change the bed, channel, or bank of any lake or stream, would be required to obtain a “Streambed Alteration Agreement” from the CDFW prior to any alteration of a lakebed, stream channel, or their banks. Through this agreement, the CDFW may impose conditions to limit and fully mitigate impacts on fish and wildlife resources.

Furthermore, the General Plan includes goals, policies, and programs designated to protect riparian habitat and other sensitive natural communities by concentrating development in previously disturbed areas and by emphasizing avoidance, minimization, and mitigation of impacts through development guidelines and standards. Chapter 7, Conservation and Open Space Element of the General Plan, Policies 1 and 3 of Goal 2 call for the preservation and enhancement of natural wildlife habitats and wildlife corridors and preservation and enhancement of streambeds and channels in a natural state, respectively. Program 1.6 directs the analysis of impacts on wildlife populations and habitats prior to project development. Program 1.12 supports reduced development intensity adjacent to areas designated as Wildland Overlay. Program 6.4 would pursue opportunities to retain areas of the Wildland Overlay as permanent open space use through various tools including acquisition, conservation easements, and establishment of a land trust. Water Element Program 2.1 would provide for the preservation and restoration of riparian corridors and establish mitigation requirements for modifications of such corridors. Program 2.2 would develop policies and standards in cooperation with Zone 7 that include restoring riparian corridors when flood and erosion control activities require channelization. Program 2.4 would direct the design of projects adjacent to the arroyos to protect habitat areas. Water Element Program 6.2 would establish reduced intensity for the development of land adjacent to areas designated as Wildland Overlay through studies which indicate the types of development posing the least potential negative impact on wildlife habitat.

Future development consistent with the Housing Element Update would be required to comply with adopted State, federal, and local regulations for the protection of riparian habitat and other sensitive natural communities. In addition, future development would comply with requirements of the General Plan goals, policies, and programs related to the protection of sensitive natural communities and riparian habitat, as described above. Implementation of these goals, policies, programs, and State and federal requirements would reduce impacts; however, the potential for impacts to special-status species, migratory species, and nesting birds remains potentially significant. Accordingly, prior to the issuance of grading permits, applicants or sponsors of specific projects on sites where potential special-status species, migratory birds, or nesting birds are present (to be determined by a qualified Biologist) would retain a qualified Biologist to prepare a Biological Resource Assessment (BRA) as required in MM BIO-1. Compliance with this mitigation measure would ensure that site-specific impacts are reduced to less than significant.

Implementation of these goals, policies, programs, requirements, and MM BIO-1 would reduce potential impacts to less than significant. Therefore, future development consistent with the Housing Element Update would not result in significant adverse effects to riparian habitat or other sensitive natural communities, and impacts would be less than significant.

Level of Significance

Potentially significant impact.

Mitigation Measures

Implement MM BIO-1.

Level of Significance After Mitigation

Less than significant impact with mitigation incorporated.

State or Federally Protected Waters and Wetlands

Impact BIO-3: **Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments could have a substantial adverse effect on State or federally protected wetlands (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means.**

As discussed in the Environmental Setting section, wetlands are found throughout the Planning Area and could be within the potential sites for rezoning. Development consistent with the Housing Element Update would result in rezoning for the purposes of future development within the potential sites for rezoning. Therefore, individual development projects consistent with the Housing Element Update could result in impacts to State and federally protected waters and wetlands.

Section 404 of the CWA requires any project that involves impacts to a protected wetland obtain a permit that authorizes fill of that feature. If a wetland is determined to be present, then a permit must be obtained from the USACE to authorize filling of the wetland. Although subsequent projects may impact protected wetlands, the regulatory process that is established through Section 404 of the CWA would ensure that there is “no net loss” of protected wetlands. If, through the design process, it is determined that a future development project cannot avoid a protected wetland, then the USACE would require that there be an equal amount of wetland created elsewhere to mitigate any loss of wetland.

Section 401 of the CWA (33 USC § 1341) requires an applicant who is seeking a 404 permit to also obtain a water quality certification from the RWQCB. To issue a water quality certification, the RWQCB must indicate that the proposed fill is consistent with the standards set forth by the State and confirm that any discharge into regulated wetlands comply with applicable water quality standards.

In addition to the regulations discussed above, because Site 27 (PUSD-Vineyard) is within the Vineyard Avenue Corridor Specific Plan Area, it would also adhere to the requirements in the Vineyard Avenue Corridor Specific Plan. Specifically, Chapter VII, Section B of the Vineyard Avenue Corridor Specific Plan requires projects to implement appropriate runoff controls (berms, storm gates, basins) to avoid erosion and runoff into seasonal drainages to control siltation and discharge of pollutants. These measures would be included in the grading plans.

Compliance with these goals, policies, programs, and State and federal requirements would reduce impacts; however, the potential for impacts to State or federally protected waters and wetlands remains potentially significant. Accordingly, prior to the issuance of grading permits, a qualified Biologist/wetland regulatory specialist would conduct a site investigation and assessment for

projects on sites where potentially jurisdictional wetlands or waterways are present. MM BIO-1 further requires that if a feature is found to be jurisdictional or potentially jurisdictional that the applicant would comply with the appropriate permitting process of each agency claiming jurisdiction prior to disturbance of the feature.

Future development consistent with the Housing Element Update would comply with adopted State, federal, and local regulations for the protection of wetlands and waters of the United States and/or State. In addition, future projects would comply with requirements of the Municipal Code and the General Plan goals, policies, and programs related to the protection of these biological resources. Lastly, future development would be required to implement MM BIO-1 to assess potential wetland impacts. Implementation of these regulations, policies, programs, and MM BIO-1 would reduce potentially significant impacts on wetlands and waters of the United States and/or State by emphasizing avoidance, minimization, and mitigation of impacts, including finding that there is “no net loss” of wetlands or other adverse effects on wetlands through hydromodification, filling, diversion, or change in water quality before approving development permits. Therefore, with mandatory regulatory compliance and implementation of MM BIO-1, future development projects consistent with the Housing Element Update would have less than significant adverse effects related to federally protected wetlands, waters of the United States, or waters of the State.

Level of Significance Before Mitigation

Potentially significant impact.

Mitigation Measures

Implement MM BIO-1.

Level of Significance After Mitigation

Less than significant impact with mitigation incorporated.

Fish and Wildlife Movement Corridors

Impact BIO-4: **Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments could interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of wildlife nursery sites.**

As described in the Environmental Setting, the Planning Area could contain wildlife movement corridors in the form of Laurel Creek, South San Ramon Creek, Chabot Canal, Tassajara Creek, and Arroyo del Valle, Arroyo Mocho and Arroyo de la Laguna, tributaries of Alameda Creek, one of the largest creeks in the San Francisco Bay Area. Exhibit 2-2 in Chapter 2, Project Description depicts these water features in relation to the potential sites for rezoning. Based on the habitats presented in Exhibit 3.3-1, some of the potential sites for rezoning may contain wildlife movement corridors. Future development consistent with the Housing Element Update could result in impacts to wildlife movement corridors or nursery sites and has the potential to interfere with the movement of native resident migratory fish or wildlife species.

Future development consistent with the Housing Element Update would comply with adopted State, federal, and local regulations for the protection of fish and wildlife movement corridors. Future development consistent with the Housing Element Update would also comply with requirements of the General Plan goals, policies, and programs related to fish and wildlife movement corridors, such as Policy 1 and Policy 2 and Program 1.1-1.6, Program 2.1, and Program 2.2 of Chapter 7, Conservation and Open Space Element, of the General Plan. Compliance with these goals, policies, programs, and State and federal requirements would reduce impacts; however, the potential for impacts to fish and wildlife movement corridors remains potentially significant.

MM BIO-1, which requires that focused surveys be conducted to determine whether special-status species, nesting birds, or migratory birds occur on a given project site and that potential impacts to special-status species be avoided and minimized, would also protect wildlife movement corridors. MM BIO-1 also requires that a site investigation and assessment be conducted for projects on sites where potentially jurisdictional wetlands or waterways are present, and compliance with the appropriate permitting process of each agency claiming jurisdiction prior to disturbance of the feature would also protect wildlife movement corridors. Therefore, future development consistent with the Housing Element Update would not result in significant adverse effects to wildlife corridors or native wildlife nursery sites, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife species to drop below self-sustaining levels, eliminate a plant or animal community, or substantially reduce the number or restrict the range of a species and impacts would be less than significant.

Level of Significance Before Mitigation

Potentially significant impact.

Mitigation Measures

Implement MM BIO-1.

Level of Significance After Mitigation

Less than significant impact with mitigation incorporated.

Local Biological Resources Policies/Ordinances Consistency

Impact BIO-5:	Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance.
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Heritage Trees are located throughout the Planning Area and could be within the potential sites for rezoning. Therefore, development within the potential sites for rezoning could impact Heritage Trees, resulting in conflicts with local policies or ordinances protecting biological resources. Heritage Trees are regulated by the City through Chapter 17.16 of the Municipal Code. Removal of any Heritage Trees requires a permit from the Community Development Director (Section 17.16.020). New property development may require a tree survey plan or a tree report by a certified consulting arborist, depending on the scope of the development, and at the discretion of the Director (Section 17.16.050). Based on the tree survey or report, the Director would recommend which trees should be preserved, or removed and replaced, in accordance with Section 17.16.020.

Future development consistent with the Housing Element Update would be subject to all applicable local policies and regulations related to the protection of biological resources. Additionally, development would be required to comply with the City's Tree Preservation Ordinance (Chapter 17.16), which would protect Heritage Trees by requiring a tree survey plan or tree report by a certified arborist at the discretion of the City's Community Development Director. Compliance with these goals, policies, programs, and State and federal requirements would reduce impacts to less than significant.

Level of Significance

Less than significant impact.

Habitat/Natural Community Conservation Plan Consistency

Impact BIO-6: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or State Habitat Conservation Plan.

None of the potential sites for rezoning are within any HCP, natural community conservation plan, or other approved HCP. All of the potential sites for rezoning are within the boundaries of the EACCS; however, the EACCS is not considered a HCP. The EACCS is intended to provide guidance during the project planning and permitting process to ensure that impacts are offset in a biologically effective manner, and individual development projects would be required to comply with the EACCS, to be confirmed during the project approval process. As such, there would be no conflicts with any HCP or natural community conservation plan and there would be no impact.

Level of Significance

No impact.

3.3.5 - Cumulative Impacts

The geographical scope of the cumulative impact analysis for biological resources is the Tri-Valley Planning Area, which includes the City of Pleasanton as well as the surrounding cities of Dublin, Livermore, and San Ramon and the Town of Danville. This analysis evaluates whether the impacts of development consistent with the Housing Element Update, together with the impacts of cumulative development, would result in a cumulatively significant impact on special-status species; wetlands and other waters of the United States and/or State; or other biological resources protected by federal, State, or local regulations or policies. This analysis then considers whether incremental contribution to cumulative impacts associated with the implementation of the Housing Element Update would be significant. Both conditions must apply for a project's cumulative effects to rise to the level of significance.

Special-status Wildlife and Plant Species

While the City of Pleasanton and surrounding region is mainly urbanized, there are areas with potential to contain special-status wildlife species, such as California red-legged frogs in the Arroyo Mocho, Alameda whipsnakes in the Pleasanton Ridglands, or rare plants, such as the long-styled

sand-spurrey on the eastern edge of the City of Pleasanton limits. Future development within the cumulative geographic context could have significant cumulative impacts on special-status species if development would be allowed to encroach in these areas. However, development of future projects within the cumulative geographic context would be required to comply with federal, State, and local laws and policies, including the Endangered Species Act and CESA, and all applicable permitting requirements of the regulatory and oversight agencies intended to address potential impacts on special-status species. Because cumulative development would be required to comply with the oversight and requirements discussed above, adhere to the overall land use vision of the applicable jurisdictions, design review regulations, and policies in local and regional plans, cumulative biological impacts would be less than significant.

The Housing Element Update's incremental contribution to these less than significant cumulative impacts would not be significant with implementation of the policies and programs described above and incorporation of MM BIO-1. For example, Goal 2, Policy 1, Program 1.1 of Chapter 7, Conservation and Open Space Element of the General Plan requires comprehensive study of ecosystems and wildlife habitat areas, to provide preservation and enhancement, including reclaiming viable habitat and providing movement corridors (Program 1.2). MM BIO-1 requires that a focused assessment be conducted to determine whether special-status species, nesting birds, or migratory birds occur on a given project site, that potential impacts to special-status species be avoided and minimized, and that any losses be fully compensated on-site or at a habitat mitigation bank. Although the Housing Element Update does not approve any specific development, MM BIO-1 would apply to future development projects consistent with the Housing Element Update and would ensure that individual development project impacts on special-status plant and wildlife species would be less than significant.

Therefore, the Housing Element Update, in combination with other projects within the cumulative context, would not result in a cumulatively significant impact on special-status species and would not result in a considerable incremental contribution to cumulative impacts to biological resources.

Sensitive Natural Communities or Riparian Habitat

There are several areas within the cumulative geographic scope in which development could result in potential impacts to sensitive natural communities and riparian habitat, including oak savannas, woodlands, and Alameda Creek and its tributaries. Future development within the geographic context could have significant cumulative impacts on sensitive natural communities and riparian habitat if development would be allowed to encroach in these areas. However, development within the cumulative geographic context would be required to comply with federal, State, and local laws and policies and all applicable permitting requirements of the regulatory and oversight agencies intended to address potential impacts on sensitive natural communities or riparian habitat. For example, future development within the cumulative geographic scope would be required to obtain a "Streambed Alteration Agreement" from CDFW prior to any alteration of a lakebed, stream channel, or their banks. The Streambed Alteration Agreement program requires projects that impact riparian habitat be mitigated at a minimum 1:1 ratio (e.g., no net loss). Because cumulative development would be required to comply with the above oversight and requirements, as well as the overall land use vision of the applicable jurisdictions, including design review regulations and policies in local and

regional plans, cumulative impacts to sensitive natural communities or riparian habitat would be less than significant.

The Housing Element Update's incremental contribution to these less than significant cumulative impacts would not be significant with implementation of the policies and programs included in the General Plan. As analyzed above, to protect sensitive habitat areas, Chapter 7, Conservation and Open Space Element of the General Plan, Policies 1 and 3 of Goal 2 call for the preservation and enhancement of natural wildlife habitats and wildlife corridors and preservation and enhancement of streambeds and channels in a natural state, respectively. Program 1.6 directs the analysis of impacts on wildlife populations and habitats prior to project development. Program 1.12 supports reduced development intensity adjacent to areas designated as Wildland Overlay. Program 6.4 would pursue opportunities to retain areas of the Wildland Overlay as permanent open space use through various tools including acquisition, conservation easements, and establishment of a land trust. Chapter 8, Water Element, of the General Plan, Program 2.1 would provide for the preservation and restoration of riparian corridors and establish mitigation requirements for modifications of such corridors. Program 2.2 would develop policies and standards in cooperation with Zone 7 that include restoring riparian corridors when flood and erosion control activities require channelization. Program 2.4 would direct the design of projects adjacent to the arroyos to protect habitat areas. Water Element Program 6.2 would establish reduced intensity for the development of land adjacent to areas designated as Wildland Overlay through studies which indicate the types of development posing the least potential negative impact on wildlife habitat. The General Plan contains policies and programs to protect habitat, and future development within the cumulative geographic context would be required to comply with regulations set forth by local, State, and federal agencies to protect biological resources. Therefore, implementation of the Housing Element Update would not result in a considerable incremental contribution to less than significant cumulative impacts to sensitive natural communities or riparian habitat. Impacts would be less than significant.

Waters of the United States and Wetlands

Future development within the geographic scope could have significant cumulative impacts on jurisdictional waters and wetlands if development would be allowed to encroach in these areas. Development within the cumulative geographic context would be required to comply with federal, State, and local laws and policies and all applicable permitting requirements of the regulatory and oversight agencies intended to address potential impacts on waters of the United States and wetlands. For example, future cumulative development within the cumulative geographic scope would be required to obtain permits from the USACE and RWQCB for any development that involves disturbance to a wetland or waters of the United States and/or State to ensure that there is "no net loss" of wetlands or jurisdictional waters. If, through the design process, it is determined that a future development project cannot avoid a wetland or jurisdictional water, then the USACE and/or RWQCB would require that there be an equal amount of wetland created elsewhere to mitigate any loss of wetland. Because cumulative development would be required to comply with the oversight and requirements as described above, as well as the overall land use vision of the applicable jurisdictions, including design review regulations and policies in local and regional plans, cumulative impacts to waters of the United States and wetlands would be less than significant.

The Housing Element Update's incremental contribution to these less than significant cumulative impacts would not be significant with implementation of the policies and programs in the General Plan, as well as MM BIO-1. As analyzed above, the Housing Element Update would comply with federal, State, and local laws and policies and all applicable permitting requirements of the regulatory and oversight agencies intended to address potential impacts on waters of the United States and wetlands, including Section 404 and 401 of the CWA. Furthermore, MM BIO-1 requires that, prior to the issuance of grading permits, a qualified Biologist/wetland regulatory specialist conduct a site investigation and assessment for projects on sites where potentially jurisdictional wetlands or waterways are present. MM BIO-1 further requires that if a feature is found to be jurisdictional or potentially jurisdictional, that the applicant would comply with the appropriate permitting process of each agency claiming jurisdiction prior to disturbance of the feature. Therefore, implementation of the Housing Element Update would not result in a considerable incremental contribution to the less than significant cumulative impacts to wetlands or jurisdictional waters.

Fish and Wildlife Movement Corridors

Future development within the cumulative geographic scope would not substantially interfere with the movement of any fish or wildlife species because development would be required to comply with federal, State, and local laws and policies and all applicable permitting requirements of the regulatory and oversight agencies intended to address potential impacts on fish and wildlife movement corridors. Because cumulative development would be required to comply with the oversight and requirements discussed above, as well as the overall land use vision of the applicable jurisdictions, including design review regulations and policies in local and regional plans, cumulative impacts would be less than significant.

Moreover, the Housing Element Update's incremental contribution to these less than significant cumulative impacts would not be significant with implementation of the policies and programs included in the General Plan as well as MM BIO-1. As analyzed above, General Plan policies and programs, such as Policy 1 and Policy 2 and Program 1.1-1.6, Program 2.1, and Program 2.2 of Chapter 7, Conservation and Open Space Element of the General Plan would ensure that habitats important to migratory wildlife such as creeks, parks, open space, and saltmarshes would not be adversely impacted without adequate measures put in place to offset any potential impacts that may result from future development. Therefore, implementation of the Housing Element Update would not result in a considerable incremental contribution to less than significant cumulative impacts to fish or wildlife movement corridors. The Housing Element Update's incremental contribution to cumulative impacts would be less than significant.

Local Policies or Ordinances

Development within the cumulative geographic context would be required to comply with local laws and policies and all applicable permitting requirements of the regulatory and oversight agencies intended to address potential impacts on biological resources. Other similar projects in the geographic area considered for the cumulative impact analysis would also be required to comply with all applicable laws and regulations, including obtaining all required regulatory permits and achieving consistency with the Tree Preservation Policy and complying with applicable HCP

requirements, and would be required to implement similar mitigation measures for any impacts caused by development in the city and the larger region. Because cumulative development would be required to comply with regulations and policies in local and regional plans, cumulative impacts would be less than significant.

The Housing Element Update's incremental contribution to these less than significant cumulative impacts would not be significant with implementation of Chapter 17.16 of the Municipal Code, which outlines the City's Tree Preservation Policy which regulates Heritage Trees and other trees located on City property. All development facilitated by the Housing Element Update would be subject to these mandatory requirements to preserve trees and other sensitive habitat. Therefore, implementation of the Housing Element Update would not result in a considerable incremental contribution to cumulative impacts with respect to conflicts with local policies or ordinances and the Housing Element Update's incremental contribution to less than significant cumulative impacts would be less than significant.

Habitat and Natural Community Conservation Plan Consistency

The Tri-Valley Planning Area, which includes the City of Pleasanton as well as the surrounding cities of Dublin, Livermore, and San Ramon and the Town of Danville are not within any HCP or community conservation plan.^{29,30} Therefore, future development within the cumulative geographic scope is not within these plans. A large portion of the Cities of Pleasanton, Dublin, and Livermore are all within the EACCS. As described above, the EACCS is not considered an HCP. The EACCS is intended to provide guidance during the project planning and permitting process to ensure that impacts are offset in a biologically effective manner, and other development projects within the geographic area considered for the cumulative impact analysis would be required to comply with the EACCS, to be confirmed during the project approval process. Because cumulative development would be required to comply with the EACCS, cumulative impacts would be less than significant.

The Housing Element Update's incremental contribution to these less than significant cumulative impacts would not be significant with adherence to the EACCS. As analyzed above, individual development projects consistent with the Housing Element Update would be required to comply with the EACCS, to be confirmed during the project approval process. As such, there would be no significant cumulative impact to biological resources relating to developments occurring in HCPs or natural community conservation plan areas.

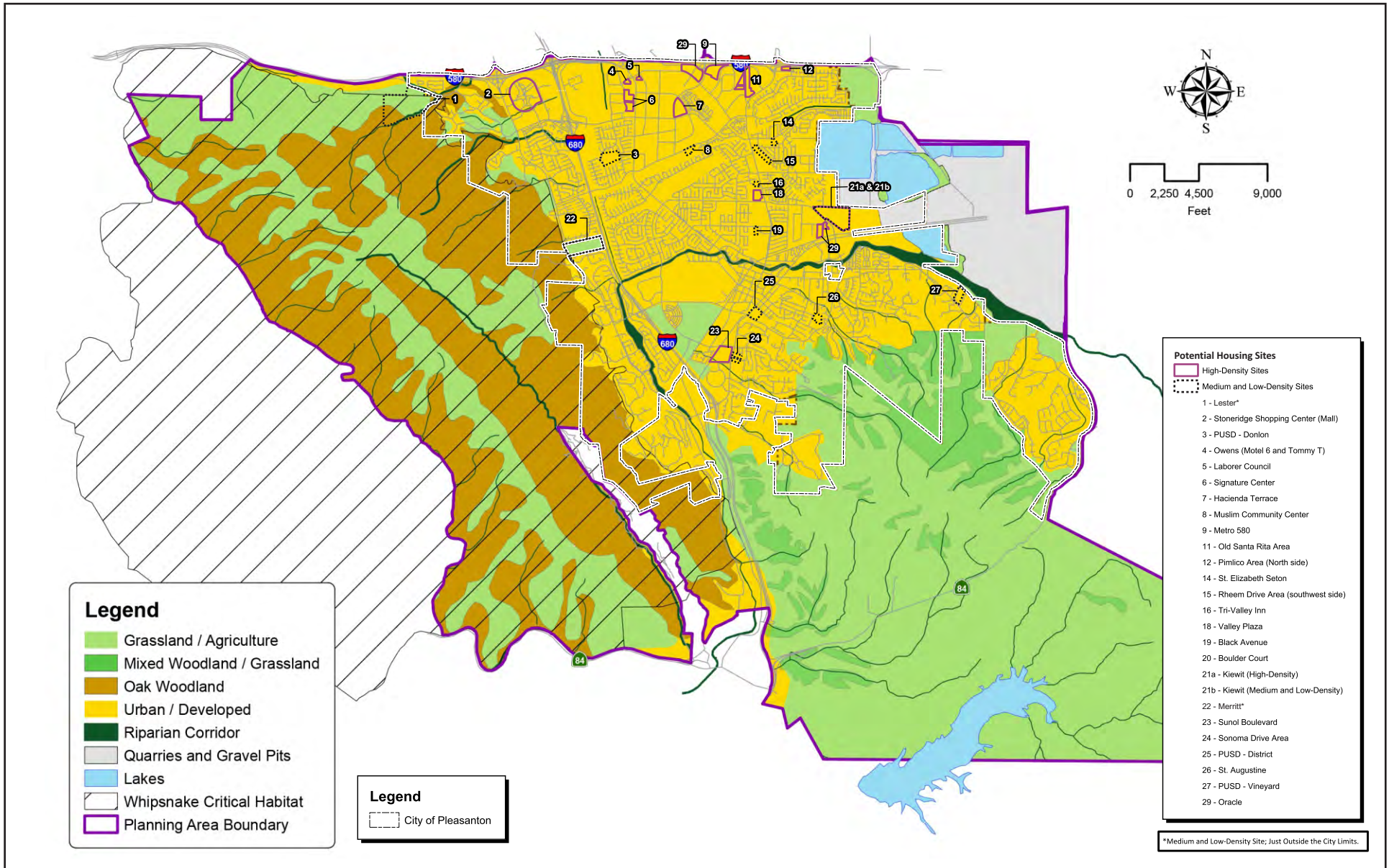
Level of Cumulative Significance

Less than significant impact.

²⁹ Data Basin. 2022. Habitat Conservation Plan (HCP), California. Website: <https://databasin.org/datasets/c116dd0d32df408cb44e4e185d98731c/>. Accessed July 11, 2022.

³⁰ California Department of Fish and Wildlife (CDFW). 2019. California Natural Community Conservation Plans. Website: <chrome-extension://efaidnbmnncipjccpglefindmkaj/https://nrm.dfg.ca.gov/FileHandler.ashx?DocumentID=68626&inline>. Accessed July 11, 2022.

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Source: City of Pleasanton.

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CNDDDB version 05/2022. Please Note:

The occurrences shown on this map represent the known locations of the species listed here as of the date of this version. There may be additional occurrences or additional species within this area which have not yet been surveyed and/or mapped. Lack of information in the CNDDDB about a species or an area can never be used as proof that no special status species occur in an area.

Legend

- City of Pleasanton
- Urban Growth Boundary
- City of Pleasanton Sphere of Influence
- Symbology**
- Plant (circular)
- Animal (non-specific)
- Animal (circular)
- Multiple (non-specific)
- Multiple (circular)
- Sensitive EO's (Commercial only)

The following species (not shown on map) are also known to occur within this page extent:

Scientific Name	Common Name
<i>Athene cunicularia</i>	burrowing owl
<i>Atriplex depressa</i>	brittlescale
<i>Atriplex minuscula</i>	lesser saltscare
<i>Branchinecta lynchi</i>	vernal pool fairy shrimp
<i>Centromadia parryi ssp. congdonii</i>	Congdon's tarplant
<i>Chloropyron palmatum</i>	palmate-bracted bird's-beak
<i>Corynorhinus townsendii</i>	Townsend's big-eared bat
<i>Elanus leucurus</i>	white-tailed kite
<i>Emys marmorata</i>	western pond turtle
<i>Eremophila alpestris actia</i>	California horned lark
<i>Extriplex joaquinana</i>	San Joaquin spearscale
<i>Linderiella occidentalis</i>	California linderiella
<i>Masticophis lateralis euryxanthus</i>	Alameda whipsnake
<i>Myotis yumanensis</i>	Yuma myotis
<i>Navarretia prostrata</i>	prostrate vernal pool navarretia
<i>Plagiobothrys glaber</i>	hairless popcornflower
<i>Polemonium carneum</i>	Oregon polemonium
<i>Puccinellia simplex</i>	California alkali grass
<i>Sycamore Alluvial Woodland</i>	Sycamore Alluvial Woodland
<i>Taxidea taxus</i>	American badger
<i>Trifolium hydrophilum</i>	saline clover
<i>Valley Sink Scrub</i>	Valley Sink Scrub
<i>Vulpes macrotis mutica</i>	San Joaquin kit fox

Scientific Name	Common Name
<i>Falco mexicanus</i>	prairie falcon
<i>Falco peregrinus anatum</i>	American peregrine falcon
<i>Antrozous pallidus</i>	pallid bat

Scientific Name	Common Name
<i>Ambystoma californiense pop. 1</i>	California tiger salamander - central California DPS
<i>Rana draytonii</i>	California red-legged frog

Scientific Name	Common Name
<i>Lasius cinereus</i>	hoary bat
<i>Rana boylei</i>	foothill yellow-legged frog

Rana draytonii
California red-legged frog

Buteo regalis
ferruginous hawk

Tropidocarpum capparideum
caper-fruited tropidocarpum

Agelaius tricolor
tricolored blackbird

Spergularia macrotheca var. longistyla
long-styled sand-spurrey

Ambystoma californiense pop. 1
California tiger salamander - central California DPS

Source: Bing Aerial Imagery. City of Pleasanton. California Natural Diversity Database (CNDDDB), May 2022.



Exhibit 3.3-2
Special-Status Species Occurrences

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3.4 - Cultural Resources and Tribal Cultural Resources

3.4.1 - Introduction

This section of the Draft Program Environmental Impact Report (Draft Program EIR) describes the existing cultural resources setting and the potential impacts related to cultural resources and Tribal Cultural Resources (TCRs) resulting from development consistent with the Housing Element Update. Future discretionary projects consistent with the Housing Element Update would be evaluated for project-specific impacts to cultural and TCRs at the time they are proposed.

Cultural resources refer broadly to prehistoric and historic buildings, structures, objects, sites, and districts exhibiting important historical, cultural, scientific, or technological associations and which exhibit historic integrity.¹ This definition extends to TCRs, which refer to sites, features, places, cultural landscapes, sacred places, and objects with cultural value to a California Native American tribe.

Information in this section is based, in part, on information provided by the City of Pleasanton General Plan (General Plan), Pleasanton Municipal Code (Municipal Code), Native American Heritage Commission (NAHC), a records search of the Sacred Lands File, National Register of Historic Places (NRHP), California Register of Historical Resources (CRHR), the California Historical Landmarks List, the California Points of Historical Interest List, and subsequent consultation with the tribal representatives identified by the NAHC who may have interest in or additional information on TCRs that may be impacted by the Housing Element Update. Appendix E contains supporting information for this section, including the NAHC Sacred Lands File Search results and copies of letters sent to the Native American tribes pursuant to Senate Bill (SB) 18.

3.4.2 - Environmental Setting

Cultural Resources and Tribal Cultural Resources Components

The term “cultural resources” encompasses historic, archaeological, TCRs, and burial sites, which are generally define as follows:

- **Historic Resources:** Historic resources are associated with the recent past. In California, historic resources are typically associated with the Spanish, Mexican, and American periods in the State’s history and are generally less than 200 years old. Historic resources often take the form of buildings, structures, and other elements of the built environment.
- **Archaeological Resources:** Archaeology is the study of artifacts and material culture with the aim of understanding human activities and cultures in the past. Archaeological resources may be associated with pre-contact indigenous cultures as well as later historic periods.

¹ To retain historic integrity a property will always possess several, and usually most, of the seven aspects of integrity. The retention of specific aspects of integrity is paramount for a property to convey its significance. Determining which of these aspects are most important to a particular property requires knowing why, where, and when the property is significant. The seven aspects of integrity include location, design, setting, materials, workmanship, feeling, and association.

- **Tribal Cultural Resources:** TCRs include sites, features, places, or objects that are of cultural value to one or more California Native American tribe.
- **Burial Sites, Cemeteries, and Native American Burial Sites:** Burial sites and cemeteries are formal or informal locations where human remains have been interred and that are of cultural value to one or more California Native American tribe.

More specifically, cultural resources may be understood as resources that have been formally recognized by a lead agency and/or are listed or determined eligible for listing on the CRHR (Public Resources Code [PRC] § 5024.1, Title 14 California Code of Regulations [CCR] § 4852). It is notable that the fact that a resource is not yet identified as a historical resource or found eligible for the CRHR does not preclude a lead agency from determining that said resource is a historical resource pursuant to Public Resources Code Sections 5020.1(j) or 5024.1. Under the California Environmental Quality Act (CEQA), a substantial adverse change in the significance of a historical resource would constitute a significant effect on the environment.

Overall Cultural Resources Setting

Following is an overview of the prehistory, ethnography, and historic background, providing a context in which to understand the background and relevance of sites and structures found within the potential sites for rezoning. This section is not intended to be a comprehensive review of the current resources available; rather, it serves as a general overview. Further details can be found in ethnographic studies, mission records, and major published sources.^{2,3,4,5,6,7}

Prehistoric Setting

The San Francisco Bay Area (Bay Area) supported a dense population of hunter-gatherers over thousands of years, leaving a rich and varied archaeological record. The Bay Area was a place of incredible language diversity, with at least seven languages spoken at the time of Spanish settlement in 1776. The diverse ecosystem of the Bay Area and surrounding lands supported an average of three to five persons per square mile but reached 11 persons per square mile in the North Bay. At the time of Spanish contact, the people of the Bay Area were organized into local tribelets that defended fixed territories under independent leaders. Typically, individual Bay Area tribelets included 200 to 400 people distributed among three to five semi-permanent villages, within territories measuring approximately 10 to 12 miles in diameter.

Archaeological investigations in Northern California have documented human occupation and activity dating from 9,000 to 11,500 years ago. Early Archaeologists in the Bay Area concentrated on recording and excavating large coastal shell mounds, including the Emeryville Shellmound (CA-ALA-309) and the Ellis Landing Site (CA-CCO-295). They discovered deeply buried stratified sites with numerous burials and associated funerary objects. The data they recovered would later help other Archaeologists to

² Kroeber, A.L. 1925. Handbook of the Indians of California. Bulletin 78. Bureau of American Ethnology. Washington, D.C.: Smithsonian Institution.

³ Beardsley, R.K. 1948. "Cultural Sequences in Central California Archaeology," American Antiquity 14:1-28.

⁴ Bennyhoff, J. 1950. Californian Fish Spears and Harpoons. Berkeley: University of California Anthropological Records 9(4):295-338.

⁵ Chartkoff J.L. and K.K. Chartkoff. 1984. The Archaeology of California. Menlo Park: Stanford University Press.

⁶ Moratto, M.J. 1984. California Archaeology. San Diego: Academic Press.

⁷ Jones, T.L. and Kathryn A. Klar. 2007. California Prehistory. Lanham: AltaMira Press; Rowman & Littlefield Publishers, Inc.

develop chronological and cultural frameworks to define the region's archaeological sites and to understand the complex movements and interactions of the indigenous people in this region.⁸

Early archaeological investigations in Central California were conducted at sites located in the Sacramento-San Joaquin Delta region. The first published account documents investigations in the Lodi and Stockton area. The initial archaeological reports typically contained descriptive narratives with more systematic approaches sponsored by Sacramento Junior College in the 1930s. At the same time, University of California at Berkeley excavated several sites in the lower Sacramento Valley and Delta region, which resulted in recognizing archaeological site patterns based on a variation of inter-site assemblages. Research during the 1930s identified temporal periods in Central California prehistory and provided an initial chronological sequence. In 1939, researcher Jeremiah Lillard of Sacramento Junior College noted that each cultural period led directly to the next and that influences spread from the Delta region to other regions in Central California.⁹ In the late 1940s and early 1950s, researcher Richard Beardsley of the University of California Berkeley documented similarities in artifacts among sites in the Bay Area and the Delta and refined his findings into a cultural model that ultimately became known as the Central California Taxonomic System (CCTS). This system proposed a uniform, linear sequence of cultural succession separated into an Early, Middle, and Late Horizon.¹⁰

To address some of the flaws in the CCTS system, D.A. Fredrickson introduced a revision that incorporated a system of spatial and cultural integrative units.¹¹ Fredrickson separated cultural, temporal, and spatial units from each other and assigned them to six chronological periods: Paleo-Indian (12,000 to 8000 Before Present [BP]); Lower, Middle and Upper Archaic (8000 to 1500 BP), and Emergent (Upper and Lower, 1500 to 250 BP). The suggested temporal ranges are similar temporally to Beardsley's horizons, which are broad cultural units that can be arranged in a temporal sequence. In addition, Fredrickson defined several patterns—a general way of life shared within a specific geographical region. These patterns include:

- Windmill Pattern or Early Horizon (4500 to 3500 BP)
- Berkeley Pattern or Middle Horizon (3500 to 1500 BP)
- Augustine Pattern or Late Horizon (1500 to 250 BP)

Brief descriptions of these temporal ranges and their unique characteristics follow.

Windmill Pattern or Early Horizon (4500 to 3500 BP)

Characterized by the Windmill Pattern, the Early Horizon was centered in the Cosumnes district of the Delta and emphasized hunting rather than gathering, as evidenced by the abundance of projectile points in relation to plant processing tools. Additionally, atlatl, dart, and spear technologies typically included stemmed projectile points of slate and chert but minimal obsidian. The large variety of projectile point types and faunal remains suggests exploitation of numerous

⁸ Moratto, M.J. 1984. California Archaeology. San Diego: Academic Press.

⁹ Lillard, J.B. and W.K. Purves. 1936. The Archaeology of the Deer Creek-Cosumnes Area, Sacramento Co., California. Sacramento. Sacramento Junior College, Department of Anthropology Bulletin 1.

¹⁰ Beardsley, R.K. 1948. Cultural Sequences in Central California Archaeology. American Antiquity.

¹¹ Frederickson, D.A. 1973. Early Cultures of the North Coast Ranges, California. Unpublished PhD dissertation, Department of Anthropology, University of California, Davis.

types of terrestrial and aquatic species.¹² Burials occurred in cemeteries and intra-village graves. These burials typically were ventrally extended, although some dorsal extensions are known with a westerly orientation and a high number of grave goods. Trade networks focused on acquisition of ornamental and ceremonial objects in finished form rather than on raw material. The presence of artifacts made of exotic materials such as quartz, obsidian, and shell indicate an extensive trade network that may represent the arrival of Utian populations into Central California. Also indicative of this period are rectangular Haliotis and Olivella shell beads and charmstones that usually were perforated.¹³

Berkeley Pattern or Middle Horizon (3500 to 1500 BP)

The Middle Horizon is characterized by the Berkeley Pattern, which displays considerable changes from the Early Horizon. This period exhibited a strong milling technology represented by minimally shaped cobble mortars and pestles, although metates and manos were still used. Dart and atlatl technologies during this period were characterized by non-stemmed projectile points made primarily of obsidian. Fredrickson suggests that the Berkeley Pattern marked the eastward expansion of Miwok groups from the Bay Area. Compared with the Early Horizon, there is a higher proportion of grinding implements at this time, implying an emphasis on plant resources rather than on hunting. Typical burials occurred within the village with flexed positions, variable cardinal orientation, and some cremations. As noted by Lillard, Heizer, and Fenenga, the practice of spreading ground ochre over the burial was common at this time. Grave goods during this period are generally sparse and typically include only utilitarian items and a few ornamental objects. However, objects such as charmstones, quartz crystals, and bone whistles occasionally were present, which suggest the religious or ceremonial significance of the individual.¹⁴ During this period, larger populations are suggested by the number and depth of sites compared with the Windmiller Pattern. According to Fredrickson, the Berkeley Pattern reflects gradual expansion or assimilation of different populations rather than sudden population replacement and a gradual shift in economic emphasis.¹⁵

Augustine Pattern or Late Horizon (1500 to 250 BP)

The Late Horizon is characterized by the Augustine Pattern, which represents a shift in the general subsistence pattern. Changes include the introduction of bow and arrow technology and, most importantly, acorns became the predominant food resource. Trade systems expanded to include raw resources as well as finished products. There are more baked clay artifacts and extensive use of Haliotis ornaments of many elaborate shapes and forms. According to Moratto, burial patterns retained the use of flexed burials with variable orientation, but there was a reduction in the use of ochre and widespread evidence of cremation.¹⁶ Judging from the number and types of grave goods associated with the two types of burials, cremation seems to have been reserved for individuals of higher status, whereas other individuals were buried in flexed positions. Johnson suggests that the

¹² Bennyhoff, J. 1950. Californian Fish Spears and Harpoons. University of California Anthropological Records.

¹³ Ragir, S.R. 1972. The Early Horizon in Central California Prehistory. Contributions of the University of California Archaeological Research Facility 15. Berkeley, CA.

¹⁴ Lillard, J.B., R.F. Heizer, and F. Fenenga. 1939. An Introduction to the Archaeology of Central California. Sacramento Junior College, Department of Anthropology, Bulletin 2.

¹⁵ Fredrickson, D.A. 1973. Early Cultures of the North Coast of the North Coast Ranges, California. PhD dissertation.

¹⁶ Moratto, M.J. 1984. California Archaeology. San Diego: Academic Press.

Augustine Pattern represents expansion of the Wintuan population from the north, which resulted in combining new traits with those established during the Berkeley Pattern.¹⁷

Bay Area archaeological research has expanded from an emphasis on defining chronological and cultural units to a more comprehensive look at settlement and subsistence systems. This shift is illustrated by the early use of burials to identify mortuary assemblages and more recent research using osteological data to determine the health of prehistoric populations. Although debate continues over a single model or sequence for California, the general framework consisting of three temporal/cultural units is generally accepted, although the identification of regional and local variation is a major goal of current archaeological research.

Ethnographic Setting

Native American Background

The Ohlone (Costanoan)

At the time of European contact, Pleasanton was occupied by various tribelets that were part of the Ohlone (previously Costanoan) tribe of California Native Americans. The Ohlone group designates a language family consisting of eight branches of the Ohlone language that are considered too distinct to be dialects, wherein each is related to its geographically adjacent neighbors. These groups lived in approximately 50 separate and politically autonomous tribelet areas, each with one or more permanent villages, between the North San Francisco Bay and the lower Salinas River.¹⁸

The arrival of Ohlone groups into the Bay Area appears to be temporally consistent with the appearance of the Late Period artifact assemblage in the archaeological record. It is probable that the Ohlone moved south and west from the Delta region of the San Joaquin-Sacramento River into the Bay Area during the Late Prehistoric.

The various Ohlone tribes subsisted as hunter-gatherers and relied on local terrestrial and marine flora and fauna for subsistence.¹⁹ The predominant plant food source was the acorn, but they also exploited a wide range of other plants, including various seeds, buckeye, berries, and roots. Protein sources included grizzly bear, elk, sea lions, antelope, and black-tailed deer as well as smaller mammals such as raccoon, brush rabbit, ground squirrels, and wood rats. Waterfowl, including Canadian geese, mallards, green-winged teal, and American widgeon, were captured in nets using decoys to attract them. Fish also played an important role in the Ohlone diet and included steelhead, salmon, and sturgeon.²⁰ Like other Native Californians, the Ohlone managed their environment to improve it for their use. For example, the Ohlone burned grass and brush lands annually to improve productivity of forage habitat for deer and rabbits and safety by keeping the land open with clear sight lines to better spot predators or neighbors.

¹⁷ Johnson, J.J. 1976. Archaeological Investigations at the Blodgett Site (CA-SAC-267), Sloughhouse Locality, California. Report to the United States National Parks Service, Western Regional Office, Tucson, Arizona.

¹⁸ Levy, R. 1978. Costanoan. In California, edited by Robert F. Heizer. Handbook of North American Indians, Vol. 8. W.G. Sturtevant, general editor, Smithsonian Institution, Washington D.C.

¹⁹ Ibid.

²⁰ Jones, T.L. and Kathryn A. Klar. 2007. California Prehistory. Lanham: AltaMira Press; Rowman & Littlefield Publishers, Inc.

The Ohlone constructed watercraft from tule reeds and possessed bow and arrow technology. They fashioned blankets from sea otter pelts, fabricated basketry from twined reeds of various types, and assembled a variety of stone and bone tools in their assemblages. Ohlone villages typically consisted of domed dwelling structures, communal sweathouses, dance enclosures, and assembly houses constructed from thatched tule reeds and a combination of wild grasses, wild alfalfa, and ferns.

The Ohlone were politically organized into autonomous tribelets that had distinct cultural territories. Individual tribelets contained one or more villages with a number of seasonal camps for resource procurement within the tribelet territory. The tribelet chief could be either male or female, and the position was inherited patrilineally, but approval of the community was required. The tribelet chief and council were essentially advisors to the community and were responsible for feeding visitors, directing hunting and fishing expeditions, ceremonial activities, and warfare on neighboring tribelets.

The Gold Rush brought disease to the Native inhabitants, and by the 1850s, nearly all the Ohlone had adapted in some way or another to economies based on cash income. Hunting and gathering activities continued to decline and were rapidly replaced with economies based on ranching and farming.²¹

Regional Historic Background

The history of Northern California can be divided into several periods of influence; pertinent historic periods are briefly summarized below.

Spanish and Mexican Period

Spanish exploration into the Central Valley dates to the late 1700s. Spanish mission records indicate that by 1800, Costanoan-speaking peoples and other villages were being taken to Mission Dolores, and Mission Sonoma, built in 1823, was baptizing tribal members until secularization of the missions in 1833. Many Native Americans were not willing converts: there are numerous accounts of neophytes fleeing the missions, and a series of “Indian Wars” broke out when the Spanish tried to return them to the missions.²² During this period, Native American populations were declining rapidly because of an influx of Euro-American diseases. In 1832, a party of trappers from the Hudson’s Bay Company, led by John Work, traveled down the Sacramento River, unintentionally spreading a malaria epidemic to Native Californians. Four years later, a smallpox epidemic decimated local populations.²³

The Mexican Period, 1821 to 1848, was marked by secularization and division of mission lands among the *Californios* as land grants, termed ranchos. During this period, Mariano G. Vallejo assumed authority of Sonoma Mission and established a friendly relationship with the Native Americans who were living there. In particular, Vallejo worked closely with Chief Solano, a Patwin who served as Vallejo’s spokesperson when problems with Native American tribes arose. The large rancho lands often were worked by Native Americans who were used as forced labor.

²¹ Levy, R. 1978. Costanoan. In California, edited by Robert F. Heizer. Handbook of North American Indians, Vol. 8. W.G. Sturtevant, general editor, Smithsonian Institution, Washington D.C.

²² Johnson, P.J. 1978. Patwin. In R.F. Heizer, vol. ed., Handbook of the North American Indians, Vol. 8. Washington, DC: Smithsonian Institution.

²³ Cook, S.F. 1955. The Epidemic of 1830–1833 in California and Oregon. American Archaeology and Ethnology.

The Gold Rush and American Expansion

In 1848, James W. Marshall discovered gold at Coloma in modern-day El Dorado County, which started the Gold Rush into the region that forever altered the course of California's history. The arrival of thousands of gold seekers in the territory contributed to the exploration and settlement of the entire State. By late 1848, approximately four out of five men in California were gold miners.²⁴ The Gold Rush originated along the reaches of the American River and other tributaries to the Sacramento River, and Hangtown, present-day Placerville, became the closest town offering mining supplies and other necessities for the miners in El Dorado County. Gold was subsequently found in the tributaries to the San Joaquin River, which flowed north to join the Sacramento River in the Great Delta east of San Francisco Bay.

As mining spread, mining techniques changed. Initially, miners relied on gold panning in a shallow pan until the heavier, gold-bearing materials fell to the bottom while the water and lighter sand spilled out over the rim. This technique was displaced by simple mining machines like the wooden "rocker" into which pails of water were emptied and processed at one time. The gold in and around stream beds was soon exhausted, and hard-rock mining took over, digging shafts up to 40 feet deep with horizontal tunnels radiating from these shafts in search of subterranean veins of gold-bearing quartz.²⁵

By 1864, California's Gold Rush had essentially ended. The rich surface and river placers were largely exhausted and the miners either returned to their homelands or stayed to start new lives in California. After the gold rush, people in towns such as Jackson, Placerville, and Sonora turned to other means of commerce, such as ranching, agriculture, and timber production. With the decline of gold mining, agriculture and ranching came to the forefront in the California's economy. California's natural resources and moderate climate proved well suited for cultivation of a variety of fruits, nuts, vegetables, and grains.²⁶

Local History

Alameda County

Alameda County occupies the eastern portion of the East Bay region of the Bay Area. The county was formed in March of 1853 from portions of Contra Costa and Santa Clara counties. Alameda County, like much of California, was seen as a land of economic opportunity, not just for its mining resources but also for its productive land where farmers could cultivate a variety of crops. Agriculture became important in the California economy in the late 1850s, and, through to the 1860s, homesteading became a means by which people could own and operate a family farm. The decidedly agricultural focus also underpins the historical significance of the Spanish colonial and Mexican era of land grants. The variety of cultural traditions, technological developments, and ideological views further underwrite the county's agricultural history. The county's rural setting continues to support farming and ranching operations.

²⁴ Robinson, W.W. 1948. *Land in California*. Berkeley: University of California Press.

²⁵ The Museum of the City of San Francisco. No date. *California Notes*. Website: <http://www.sfmuseum.org/hist9/turrillgold.html>. Accessed June 6, 2022.

²⁶ Beck, W. and Y.D. Haase. 1974. *Historical Atlas of California*. Norman, Oklahoma: University of Oklahoma Press.

As early as 1887, special interests advertised the county's virtues as a place to cultivate. Early settlers began to speak of beneficial soils that support a range of crops—oranges, lemons, olives, pomegranates, figs, and grapes flourished—with seasonal rainfall and suitable climates. In addition, the welcoming character of towns, regional accessibility, and schools further encouraged westward migration.

A variety of crops flourished in the county because of favorable sub-climate conditions. Cultivated lands expanded with changes and advancements in the agricultural industry that encouraged farmers to adapt operations and remain relevant. More generally, stable crops such as wheat and specialty crop agriculture were an important component of California's agricultural history. Between 1880 and 1900, for example, farmers shifted from apples to fruits such as peaches, plums, prunes, apricots, and pears. The shift boosted California's orchard industries, coinciding with accelerated growth in local drying and canning industries. The development of these specialized crops gave California an economic buffer when wheat prices declined in the early twentieth century.

Large-scale commercial operations began to capitalize on mechanical innovations just as irrigation developed in the early 1880s. Consequently, competing economic interests caused land prices to increase and make family farming a less profitable enterprise. Following the world wars, large companies followed their employees to suburban areas east of San Francisco. The establishment of large population centers fostered the development of equally large shopping centers. To meet demand on infrastructure, the State modernized highways and roadways. With the establishment of the Bay Area Rapid Transit (BART) system, the cities in the central county turned to spawn their own suburbs. The once outlying rural areas of Antioch, Oakley, and Brentwood continued to grow.

City of Pleasanton

The City of Pleasanton transformed from a small stopover on the way to Gold Country in the early 1800s into a city of suburban character dominated by detached single-family homes. Since the 1980s, the city has been heavily redeveloped into a suburban community. Pleasanton is approximately 25 miles east of Oakland, 5 miles north of Fremont, and 6 miles west of Livermore. Interstate 580 (I-580) is the main highway between the cities of Pleasanton and Livermore and is the main route leading into Oakland and San Francisco. In addition, I-680 is located approximately 0.75 mile to the west.

Jose Amador created the first settlement in 1826, which was called Alisal. It was located on the lands of the Rancho Santa Rita near the site of an Indian ranchera, around the Francisco Solano Alviso Adobe, called El Alisal, or The Sycamores. The city's modern history stems from the transcontinental railroad in 1869, which accelerated population growth and rapidly increased the economy. Pleasanton was incorporated in 1894 and by 1900 became a prosperous community. Main Street became a center for business and offered the community a bank and several hotels. In 1930, Henry J. Kaiser created the hugely profitable gravel industry by realizing the potential of sand and gravel below the Amador Valley. However, by 1979 much of Pleasanton was redeveloped into homes, schools, and urban land uses. In 1982, the Hacienda Business Park kick-started corporate company

growth and changed the city. Currently, Pleasanton is home to multinational corporations such as Oracle and is a mid-sized bedroom community.²⁷

Summary of Existing Cultural Resources

Historic Architectural Resources

There are several historic buildings in the city that represent significant human-made resources from the city's early development. The city's oldest structure is the Alviso Adobe, which dates from 1844 and is located on the west side of Foothill Road, just north of Bernal Avenue. Alviso Adobe is used as a historical park and the adobe brick building was restored in 2009. Two historic buildings, the Heathcote-MacKenzie House at the Alameda County Fairgrounds and Kottinger Barn at 200 Ray Street, are listed on the National Register of Historic Places.²⁸ The Downtown area contains most of Pleasanton's historic buildings dating from the nineteenth and early twentieth centuries. Table 7-3 of the Conservation and Open Space Element further describes all the historic development in the Downtown area. None of the potential sites for rezoning are within the Downtown Specific Plan area (Exhibit 2-3 in Chapter 2, Project Description). Site 25 (PUSD-District) is just south of the 'First, Second, Third Streets' historic neighborhood as shown in Figure 7-3 of the General Plan Conservation and Open Space Element.

Archaeological Resources

Ohlone (or Costanoan) habitation, Spanish settlers during the mission period, immigrants during the California Gold Rush, and people drawn to the city for agricultural and other resources constitute the city's rich cultural past and have consequently contributed to the archaeological record. Pre-contact archaeological remains are scattered throughout the city and concentrate mostly along arroyos and near former marshlands and springs. According to a review of available records by the Northwest Information Center (NWIC) of the California Archaeological Inventory, there are several recorded and reported pre-contact, and historic-era archaeological sites in the city. These sites include a prehistoric camp or temporary village; a prehistoric occupation site with mortars, pestles, and arrowheads; two sites that contain chert tools and cranial fragments; and a historic farmhouse.

Tribal Cultural Resources

Ohlone tribal groups have resided in the East Bay for over 7,000 years, far longer than the European occupation, and they continue to have a presence in the city. During the mid-nineteenth and early twentieth centuries, Muwekma Ohlone tribal ancestors resided in Alisal Rancheria, Sunol Rancheria, and Arroyo Mocho Rancheria (Livermore). These families worked on the local ranches, vineyards and hopyards. Tribal men and women have and continue to serve in the United States Armed Forces; many were baptized and buried at St. Augustine's Church and Mission San Jose. Several direct ancestors of the Muwekma Ohlone Indian Tribe have been traced to Pleasanton and the larger Tri-Valley area and tribal members continue to live in this area.²⁹

²⁷ Pleasanton Chamber of Commerce. 2022. History of Pleasanton. Website: <https://www.pleasanton.org/history-of-pleasanton/>. Accessed June 6, 2022.

²⁸ City of Pleasanton. 2011. Supplemental Environmental Impact Report Housing Element and Climate Action Plan General Plan Amendment and Rezoning. September

²⁹ City of Pleasanton. 2009. General Plan, Conservation and Open Space Element. July.

3.4.3 - Regulatory Framework

Federal

National Historic Preservation Act

The National Historic Preservation Act of 1966 (NHPA), as amended, established the NRHP, which contains an inventory of the nation's significant prehistoric and historic properties. Under 36 Code of Federal Regulations 60, a property is recommended for possible inclusion on the NRHP if it is at least 50 years old, has integrity, and meets one of the following criteria:

- It is associated with significant events in history or broad patterns of events.
- It is associated with significant people in the past.
- It embodies the distinctive characteristics of an architectural type, period, or method of construction; or it is the work of a master or possesses high artistic value; or it represents a significant and distinguishable entity whose components may lack individual distinction.
- It has yielded, or may yield, information important in history or prehistory.

Certain types of properties are usually excluded from consideration for listing in the NRHP, but they can be considered if they meet special requirements in addition to meeting the criteria listed above. Such properties include religious sites, relocated properties, graves and cemeteries, reconstructed properties, commemorative properties, and properties that have achieved significance within the past 50 years.

Archaeological Resources Protection Act

The Archaeological Resources Protection Act (ARPA) amended the Antiquities Act of 1906 (16 United States Code [USC] 431–433) and set a broad policy that archaeological resources are important to the nation and should be protected, and required special permits before the excavation or removal of archaeological resources from public or Native American lands. The purpose of the ARPA was to secure, for the present and future benefit of the American people, the protection of archaeological resources and sites that are on public lands and Native American lands and to foster increased cooperation and exchange of information between governmental authorities, the professional archaeological community, and private individuals having collections of archaeological resources and data that were obtained before October 31, 1979.

American Indian Religious Freedom Act

The American Indian Religious Freedom Act (AIRFA) established federal policy to protect and preserve the inherent rights of freedom for Native groups to believe, express, and exercise their traditional religions. These rights include but are not limited to access to sites, use and possession of sacred objects, and freedom to worship through ceremonials and traditional rites.

Native American Graves Protection and Repatriation Act

The Native American Graves Protection and Repatriation Act (NAGPRA) of 1990 sets provisions for the intentional removal and inadvertent discovery of human remains and other cultural items from federal and tribal lands. It clarifies the ownership of human remains and sets forth a process for

repatriation of human remains and associated funerary objects and sacred religious objects to the Native American groups claiming to be lineal descendants or culturally affiliated with the remains or objects. It requires any federally funded institution housing Native American remains or artifacts to compile an inventory of all cultural items within the museum or with its agency and to provide a summary to any Native American tribe claiming affiliation.

State

CEQA Guidelines Section 15064.5(a)—CEQA Definition of Historical Resources

CEQA Guidelines Section 15064.5(a), in Title 14 of the California Code of Regulations, defines a “historical resource” as:

1. A resource listed in, or determined to be eligible by the State Historical Resources Commission, for listing in the California Register of Historical Resources.
2. A resource included in a local register of historical resources, as defined in Section 5020.1(k) of the Public Resources Code or identified as significant in a historical resource survey meeting the requirements of Section 5024.1(g) of the Public Resources Code, shall be presumed to be historically or culturally significant. Public agencies must treat any such resource as significant unless the preponderance of evidence demonstrates that it is not historically or culturally significant.
3. Any object, building, structure, site, area, place, record, or manuscript which a lead agency determines to be historically significant or significant in the architectural, engineering, scientific, economic, agricultural, educational, social, political, military, or cultural annals of California may be considered to be a historical resource, provided the lead agency’s determination is supported by substantial evidence in light of the whole record. Generally, a resource shall be considered by the lead agency to be “historically significant” if the resource meets the criteria for listing on the California Register of Historical Resources.
4. The fact that a resource is not listed in, or determined to be eligible for listing in the California Register of Historical Resources, not included in a local register of historical resources (pursuant to Section 5020.1(k) of the Public Resources Code), or identified in a historical resources survey (meeting the criteria in Section 5024.1(g) of the Public Resources Code) does not preclude a lead agency from determining that the resource may be a historical resource as defined in Public Resources Code Sections 5020.1(j) or 5024.1.

Therefore, under the CEQA Guidelines, even if a resource is not included on any local, State, or federal register, or identified in a qualifying historical resources survey, a lead agency may still determine that any resource is a historical resource for the purposes of CEQA if there is substantial evidence supporting such a determination. A lead agency must consider a resource to be historically significant if it finds that the resource meets the criteria for listing in the CRHR. Archaeological and historical sites are protected pursuant to a wide variety of State policies and regulations, as enumerated in the Public Resources Code. Cultural resources are recognized as nonrenewable resources and receive additional protection under the Public Resources Code and CEQA.

CEQA Guidelines Section 15064.5(a)(3)—California Register of Historical Resources Criteria

As defined by CEQA Guidelines, Section 15064.5(a)(3)(A-D), a resource shall be considered historically significant if the resource meets the criteria for listing on the CRHR. The CRHR and many local preservation ordinances have employed the criteria for eligibility to the NRHP as a model (see criteria described above under the description of the NHPA) since the NHPA provides the highest standard for evaluating the significance of historic resources. A resource that meets NRHP criteria is clearly significant. In addition, a resource that does not meet NRHP standards may still be considered historically significant at a local or State level.

California Public Resources Code Section 5024.1—California Register of Historic Resources

Section 5024.1 of the Public Resources Code states that the CRHR is a guide to be used by State and local agencies, private groups, and citizens to identify the State’s historical resources and to indicate what properties are to be protected from substantial adverse change. Administration of the CRHR is to be overseen by the NAHC. Section 5024.1 indicates that the register shall include historical resources determined by the NAHC, according to adopted procedures, to be significant and to meet the criteria in subdivision (c).

CEQA Guidelines 15064.5(c)—Effects on Archaeological Resources

CEQA Guidelines state that a resource need not be listed on any register to be found historically significant. CEQA Guidelines direct lead agencies to evaluate archaeological sites to determine whether they meet the criteria for listing in the CRHR. If an archaeological site is a historical resource, in that it is listed or eligible for listing in the CRHR, potential adverse impacts to it must be considered. If an archaeological site is considered not to be a historical resource but meets the definition of a “unique archaeological resource” as defined in Public Resources Code Section 21083.2, then it would be treated in accordance with the provisions of that section.

CEQA Guidelines Section 15064.5(d)—Effects on Human Remains

Native American human remains and associated burial items may be significant to descendant communities and/or may be scientifically important for their informational value. They may be significant to descendant communities for patrimonial, cultural, lineage, and religious reasons. Human remains may also be important to the scientific community, such as prehistorians, epidemiologists, and physical anthropologists. The specific stake of some descendant groups in ancestral burials is a matter of law for some groups, such as Native Americans (CEQA Guidelines § 15064.5(d); PRC § 5097.98). CEQA and other State laws and regulations regarding Native American human remains provide the following procedural requirements to assist in avoiding potential adverse effects on human remains within the contexts of their value to both descendant communities and the scientific community:

- When an initial study identifies the existence or probable likelihood that a project would affect Native American human remains, the lead agency is to contact and work with the appropriate Native American representatives identified through the NAHC to develop an agreement for the treatment and disposal of the human remains and any associated burial items (CEQA Guidelines § 15064.5(d); PRC § 5097.98).

- If human remains are accidentally discovered, the county coroner must be contacted. If the county coroner determines that the human remains are Native American, the coroner must contact the NAHC within 24 hours. The NAHC must identify the most likely descendant (MLD) to provide for the opportunity to make recommendations for the treatment and disposal of the human remains and associated burial items.
- If the MLD fails to make recommendations within 24 hours of notification or the project applicant rejects the recommendations of the MLD, the Native American human remains and associated burial items must be reburied in a location not subject to future disturbance within the project site (PRC § 5097.98).
- If potentially affected human remains or a burial site may have scientific significance, whether or not it has significance to Native Americans or other descendant communities, then under CEQA, the appropriate mitigation of effect may require the recovery of the scientific information of the remains/burial through identification, evaluation, data recovery, analysis, and interpretation (CEQA Guidelines § 15064.5(c)(2)).

California Public Resources Code Section 5097.91—Native American Heritage Commission

Section 5097.91 of the Public Resources Code established the NAHC, whose duties include the inventory of places of religious or social significance to Native Americans and the identification of known graves and cemeteries of Native Americans on private lands. Under Section 5097.91 of the Public Resources Code, a State policy of noninterference with the free expression or exercise of Native American religion was articulated along with a prohibition of severe or irreparable damage to Native American sanctified cemeteries, places of worship, religious or ceremonial sites, or sacred shrines located on public property. Section 5097.98 of the Public Resources Code specifies a protocol to be followed when the NAHC receives notification of a discovery of Native American human remains from a county coroner. Section 5097.5 defines as a misdemeanor the unauthorized disturbance or removal of archaeological, historic, or paleontological resources located on public lands.

California Senate Bill 18—Protection of Tribal Cultural Places

SB 18 (California Government Code § 65352.3) incorporates the protection of California traditional tribal cultural places into land use planning for cities, counties, and agencies by establishing responsibilities for local governments to contact, refer plans to, and consult with California Native American tribes as part of the adoption or amendment of any general or specific plan proposed on or after March 1, 2005. SB 18 requires public notice to be sent to tribes listed on the NAHC SB 18 Tribal Consultation list within the geographical areas affected by the proposed changes. Tribes must respond to a local government notice within 90 days (unless a shorter time frame has been agreed upon by the tribe), indicating whether or not they want to consult with the local government. Consultations are for the purpose of preserving or mitigating impacts to places, features, and objects described in Sections 5097.9 and 5097.993 of the Public Resources Code that may be affected by the proposed adoption or amendment to a general or specific plan.

California Assembly Bill 52—Effects on Tribal Cultural Resources

Assembly Bill (AB) 52 (2014) provides that any public or private “project with an effect that may cause a substantial adverse change in the significance of a tribal cultural resource is a project that may have a significant effect on the environment.” TCRs include “[s]ites, features, places, cultural landscapes, sacred places, and objects with cultural value to a California Native American tribe that are eligible for inclusion in the California Register of Historical Resources or included in a local register of historical resources.” Under prior law, TCRs were typically addressed under the umbrella of “cultural resources,” as discussed above. AB 52 formally added the category of “tribal cultural resources” to CEQA and extends the consultation and confidentiality requirements to all projects, rather than just projects subject to SB 18 as discussed above.

The parties must consult in good faith, and consultation is deemed concluded when either: (1) the parties agree to measures to mitigate or avoid a significant effect on a TCRs (if such a significant effect exists); or (2) when a party concludes that mutual agreement cannot be reached. Mitigation measures agreed upon during consultation must be recommended for inclusion in the environmental document. AB 52 also identifies mitigation measures that may be considered to avoid significant impacts if there is no agreement on appropriate mitigation. Recommended measures include:

- Preservation in place
- Protecting the cultural character and integrity of the resource
- Protecting the traditional use of the resource
- Protecting the confidentiality of the resource
- Permanent conservation easements with culturally appropriate management criteria

California Public Resources Code Section 21074—Effects on Tribal Cultural Resources

AB 52 amended the CEQA statute to identify an additional category of resource to be considered under CEQA, called “tribal cultural resources,” and added Public Resource Code Section 21074, which defines “tribal cultural resources” as follows:

- (a) “Tribal cultural resources” are either of the following:
- (1) Sites, features, places, cultural landscapes, sacred places, and objects with cultural value to a California Native American tribe that are either of the following:
 - A) Included or determined to be eligible for inclusion in the CRHR.
 - B) Included in a local register of historical resources as defined in subdivision (k) of Section 5020.1.
 - (2) A resource determined by the lead agency, in its discretion and supported by substantial evidence, to be significant pursuant to criteria set forth in subdivision (c) of Section 5024.1. In applying the criteria set forth in subdivision (c) of Section 5024.1 for the purposes of this paragraph, the lead agency shall consider the significance of the resource to a California Native American tribe.
- (b) A cultural landscape that meets the criteria of subdivision (a) is a tribal cultural resource to the extent that the landscape is geographically defined in terms of the size and scope of the landscape.

- (c) A historical resource described in Section 21084.1, a unique archaeological resource as defined in subdivision (g) of Section 21083.2, or a “nonunique archaeological resource” as defined in subdivision (h) of Section 21083.2 may also be a tribal cultural resource if it conforms with the criteria of subdivision (a).

Health and Safety Code Section 7050.5 (Treatment of Human Remains)

Section 7050.5 of the California Health and Safety Code sets forth provisions related to the treatment of human remains. As the Code states, “every person who knowingly mutilates or disinters, wantonly disturbs, or willfully removes any human remains in or from any location other than a dedicated cemetery without authority of law is guilty of a misdemeanor” except under circumstances as provided in Section 5097.99 of the Public Resources Code. The regulations also provide guidelines for the treatment of human remains found in locations other than a dedicated cemetery, including responsibilities of the Coroner.

Public Resources Code Section 5097.98 (Discovery of Human Remains)

Section 5097.98 provides protocol for the discovery of human remains. It states that “when the commission receives notification of a discovery of Native American human remains from a county coroner pursuant to subdivision (c) of Section 7050.5 of the Health and Safety Code, it shall immediately notify persons believed to be most likely descended from the deceased Native American.” It also sets forth provisions for descendants’ preferences for treatment of the human remains and what should be done if the commission is unable to identify a descendant.

Local

City of Pleasanton General Plan

Open Space and Conservation Element

The Open Space and Conservation Element, Chapter 7 of the General Plan, provides guidance, policies, and programs to conserve and manage natural resource and open space areas for the preservation, production, and enjoyment of natural and cultural resources and for the promotion of open space recreation, protection of public health and safety, and preservation of valuable wildlands.

Natural Resources

Goal 2 Preserve and enhance the natural resources of the Planning Area, including plant and wildlife habitats, heritage trees, scenic resources, and watercourses.

Policy 1 Preserve and enhance natural wildlife habitats and wildlife corridors.

Program 1.7 Minimize active recreation—sports, games, exercising, and fishing—within natural habitat areas. Permit passive recreation such as hiking, bicycling, horseback riding, nature and cultural resource study, photography, and picnicking.

Cultural and Historic Resources

Goal 4 Designate, preserve, and protect the archaeological and historic resources within the Pleasanton Planning Area.

- Policy 5** Preserve and rehabilitate those cultural and historic resources which are significant to Pleasanton because of their age, appearance, or history.
- Program 5.1** When reviewing applications for development projects, use information regarding known archaeological finds in the Planning Area to determine whether an archaeological study, construction monitoring or other mitigations are appropriate. Require that archaeological studies meet the requirements of the California Environmental Quality Act Guidelines Section 15064.5 in identifying mitigation measures if an archaeological site is encountered. Include provisions for the interpretation of cultural resources. Consult with the California Archaeological Inventory, Northwest Information Center, as necessary.
- Program 5.2** Follow the recommendations contained within archaeological and historical architecture studies regarding rehabilitation or preservation of archaeologically or historically significant structures and sites.
- Program 5.3** Continue to include a standard condition of project approval to require the cessation of all construction and grading activities within the vicinity of any discovered prehistoric or historic artifacts, or other indications of cultural resources, until any such find is evaluated by a qualified professional Archaeologist, and appropriate mitigation is approved by the City.
- Program 5.5** Encourage the use of educational workshops, exhibits, and teaching materials that celebrate the City’s history, ancestral heritage, and Native American contributions, and encourage participation by Native American groups in developing such programs.

Community Character Element

The Community Character Element, Chapter 12 of the General Plan, identifies the physical and social aspects of Pleasanton’s unique identity and establishes goals, policies, and programs to preserve and enhance those aspects which make the city special and distinct.

- Goal 2** Preserve and enhance Downtown Pleasanton as a major focus of the community.
- Policy 1** Encourage the retention, use, and enhancement of older buildings of historical importance and architectural heritage.
- Program 1.1** Implement programs from the Conservation and Open Space Element related to historic preservation.

Public Facilities and Community Programs Element

- Goal 6** Achieve a complete park and recreation system featuring a wide variety of opportunities to serve the public need.
- Policy 10** Provide sufficient parkland and recreational activities to accommodate existing and future needs of residents, workers, and visitors.

Program 10.3 Disperse neighborhood and community parks throughout the City and combine them with areas of natural, scenic, or cultural resources.

Goal 8 Improve quality of life in the City by adding and maintaining appropriate new community amenities.

Policy 18 Provide additional public facilities to enhance the community.

Vineyard Avenue Corridor Specific Plan

The Vineyard Avenue Corridor Specific Plan includes the 384-acre area along Vineyard Avenue in southeast Pleasanton. The Vineyard Avenue Corridor Specific Plan establishes a unique environment which includes a variety of agricultural, residential, open space, recreational, educational, and other uses. Objectives, policies, and guidelines regarding cultural and TCRs in the Vineyard Avenue Corridor Specific Plan are laid out in Section VII, Environmental Protection, and they include:

Policy 1 If any prehistoric or historic artifacts or other indications of cultural resources are found once project construction is underway, all work must stop within 20 meters of the find. A qualified Archaeologist shall be consulted for an immediate evaluation of the find prior to resuming ground-breaking construction activities within 20 meters of the find. If the find is determined to be an important archaeological resource, the resource shall be either avoided, if feasible, or recovered consistent with the requirements of Appendix K of the State California Environmental Quality Act Guidelines.

Policy 2 In the event of discovery or recognition of any human remains in any on-site location, there shall be no further excavation or disturbance of the site or any nearby area reasonable suspected to overlie adjacent remains until the county coroner has determined, in accordance with any laws concerning investigation of the circumstances, the manner, or the cause of death and has made recommendation concerning treatment and disposition of the human remains to the person responsible for the excavation, or to his or her authorized representative.

3.4.4 - Project Impacts and Mitigation Measures

Significance Criteria

The City is using Appendix G of the CEQA Guidelines as thresholds of significance for this project. Cultural resource and TCR impacts resulting from the implementation of the Housing Element Update would be considered significant if the project would:

- a) Cause a substantial adverse change in the significance of a historical resource as pursuant to Section 15064.5?
- b) Cause a substantial adverse change in the significance of an archaeological resource pursuant to Section 15064.5?
- c) Disturb any human remains, including those interred outside of formal cemeteries?

- d) Cause a substantial adverse change in the significance of a tribal cultural resource, defined in Public Resources Code Section 21074 as either a site, feature, place, cultural landscape that is geographically defined in terms of the size and scope of the landscape, sacred place, or object with cultural value to a California Native American tribe, and that is listed or eligible for listing in the California Register of Historical Resources, or in a local register of historical resources as defined in Public Resources Code Section 5020.1(k)?
- e) Cause a substantial adverse change in the significance of a tribal cultural resource, defined in Public Resources Code Section 21074 as either a site, feature, place, cultural landscape that is geographically defined in terms of the size and scope of the landscape, sacred place, or object with cultural value to a California Native American tribe, and that is a resource determined by the lead agency, in its discretion and supported by substantial evidence, to be significant pursuant to criteria set forth in subdivision (c) of Public Resources Code Section 5024.1?

As part of the mandatory findings of significance, Appendix G of the CEQA Guidelines requires a lead agency to determine whether a project may have a significant effect on the environment. With respect to cultural resources, to determine whether impacts related to cultural resources are significant environmental effects, the following question is analyzed and evaluated. Would the Housing Element Update:

- a) Eliminate important examples of the major periods of California history or prehistory?

Approach to Analysis

This evaluation focuses on whether development consistent with the Housing Element Update would impact historic or archaeological resources or TCRs.

Information in this section is based, in part, on information provided by the General Plan, Municipal Code, NAHC, a records search of the Sacred Lands File, NRHP, CRHR, the California Historical Landmarks List, the California Points of Historical Interest List.

On April 20, 2022, in accordance with requirements promulgated by SB 18 and AB 52, the City notified the Amah Mutsun Tribal Band, the Coastanoan Rumsen Carmel Tribe, the Indian Canyon Mutsun Band, the Muwekma Ohlone Indian Tribe of San Francisco Bay, the North Valley Yokuts Tribe, the Ohlone Indian Tribe, and Wilton Rancheria of the Housing Element Update and invited the tribes to participate in consultation (see Appendix E). To date, no responses have been received.

Appendix E contains supporting information for this section, including the NAHC Sacred Lands File Search results and copies of letters sent to the Native American tribes pursuant to SB 18. Both direct and indirect effects caused by implementation of development consistent with the Housing Element Update were considered for this analysis. Direct impacts are typically associated with construction and/or ground-disturbing activities and have the potential to immediately alter, diminish, or destroy all or part of the character and quality of archaeological resources and/or historic architecture. Indirect impacts are typically associated with post-project implementation conditions that have the potential to alter or diminish the historical setting of a cultural resource (generally historic

architecture) by introducing visual intrusions on existing historical structures that are considered undesirable.

Cultural resource impacts associated with the development on the Dublin-Pleasanton BART station property were fully evaluated in the 2015-2023 (5th Cycle) Housing Element Draft Supplemental Environmental Impact Report (State Clearinghouse No. 2011052002) and no additional impacts related to cultural resources within that site are associated with the Housing Element Update; therefore, this analysis does not include that site. Potential impacts to TCRs within the Dublin-Pleasanton BART station property are evaluated in Impact CUL-4 and Impact CUL-5.

Impact Evaluation

Historic Resources

Impact CUL-1: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not cause a substantial adverse change in the significance of a historical resource pursuant to Section 15064.5.

A substantial adverse change in the significance of a historical resource is defined at Section 15064.5(b)(1) of the CEQA Guidelines as the “physical demolition, destruction, relocation, or alteration of the resource or its immediate surroundings such that the significance of a historical resource would be materially impaired.” As described in the General Plan, Conservation and Open Space Element, known historic buildings, districts, and resource sites are located throughout the city, especially within the Downtown area. Additional undesignated sites, and potentially unidentified sites, could exist within the potential sites for rezoning.

Development consistent with the Housing Element Update would result in additional development throughout the city. Many of the potential sites for rezoning are parcels that contain existing commercial or residential buildings, which could potentially be historic resources. Therefore, subsequent development consistent with the Housing Element Update could affect known historic resources or previously unidentified or undesignated resources.

The General Plan includes policies and programs specifically designed to address the conservation and protection of historical resources. Goal 4 of the Open Space and Conservation Element requires the designation, preservation, and protection of archaeological and historic resources within the Pleasanton Planning Area. Policy 5 mandates the preservation and rehabilitation of historic resources that are significant because of their age, appearance, or history, and Program 5.1 provides additional requirements for review of applications for development projects. Pursuant to Program 5.1, in consultation with the NWIC, available information would be used to determine whether an archaeology study, construction monitoring, or other mitigations are appropriate on a project by project basis. Program 5.2 requires recommendations contained in historical architectural studies regarding rehabilitation or preservation of historically significant structures and sites to be followed. Program 5.3 requires the cessation of all construction and grading activities within the vicinity of any discovered prehistoric or historic artifacts until any such find is evaluated by a qualified professional Archaeologist, and appropriate mitigation is approved by the city. Policy 1 within Goal 2 of the Community Character Elements encourages the retention, use, and enhancement of older buildings of historical importance and architectural heritage.

With respect to Site 27 (PUSD-Vineyard), the Vineyard Avenue Corridor Specific Plan includes Policy 1 with the intent of addressing the conservation and protection of historical resources, and Policy 1 requires work to be halted if historic artifacts are found once project construction is underway until a qualified Archaeologist has been consulted.

The Municipal Code contains rules and regulations that protect historical resources. Section 18.140.030 (Fines and Restrictions on Future Development for Illegal Historic Building Demolition) states that any property owner who demolishes, or causes to be demolished, any historic building in the city is subject to fines and restrictions on future development unless the owner received prior written City approval in conjunction with a new development application or other code provision or the chief building and safety official made a determination of a dangerous building.

As described above, Site 25 (PUSD-District) is just south of the First, Second Third Street historic neighborhood. The resources within this historic neighborhood could be indirectly adversely affected through incompatible design development on Site 25 (PUSD-District). Policy 4.1 of the Housing Element Update would result in the development of guidelines and standards for residential and mixed-use development that would incorporate objective standards whenever possible for high density housing sites, such as Site 25 (PUSD-District), which would ensure subsequent development on Site 25 (PUSD-District) would be consistent with the existing character of the First, Second Third Street historic neighborhood (Program 4.2). Compliance with applicable current federal, State, and local laws as well as the goals, policies, and programs included in the General Plan, described above, would reduce any potential impacts to the resources surrounding Site 25 (PUSD-District).

Furthermore, as the City receives development applications for subsequent development consistent with the Housing Element Update, those applications would be reviewed by the City for compliance with the policies and programs of the General Plan related to the protection of historical resources. The Municipal Code, which implements the General Plan, would be reviewed when development applications are received.

Lastly, individual development projects which propose to alter a building or structure greater than 45 years of age at the time an application is deemed complete, would be required to undergo project-specific environmental review in compliance with CEQA Guidelines Section 15064.5 in order for the City to determine whether the building or structure may be a historic resource, and take appropriate action such as requiring additional site-specific or project-specific measures to reduce any potential impacts. Therefore, future development consistent with the Housing Element Update would not have the potential to eliminate important examples of major periods of California history or prehistory or cause a substantial adverse change in the significance of a designated historical resource or otherwise result in significant adverse effects to historical resources and impacts would be less than significant.

Level of Significance

Less than significant impact.

Archaeological Resources

Impact CUL-2: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not cause a substantial adverse change in the significance of an archaeological resource pursuant to Section 15064.5.

As described in the General Plan, Conservation and Open Space Element, areas of Pleasanton have been previously surveyed for archaeological resources. Known archaeological resource sites are located within the city. According to a review of available records by the NWIC, there are several recorded and reported prehistoric and historic archaeological sites in the city. These sites include a prehistoric camp or temporary village; a prehistoric occupation site with mortars, pestles, and arrowheads; two sites that contain chert tools and cranial fragments; and a historic farmhouse. Undiscovered archaeological sites could exist within the potential sites for rezoning. Development consistent with the Housing Element Update would result in additional development throughout the city and could therefore affect known archaeological resources or previously unidentified or undesignated archaeological resources.

The potential for additional archaeological sites to be present within the potential sites for rezoning exists but varies by location. As discussed in the 2015-2023 (5th Cycle) Housing Element EIR, based on previous cultural resources surveys, it is anticipated that portions of the city lying in the flat valley have a low sensitivity for prehistoric sites, except along drainages. However, the hills to the west and south, especially around springs and creeks, are anticipated to have a relatively high sensitivity for containing prehistoric sites.³⁰ Most of the potential sites for rezoning are in the flat valley area on parcels that have been previously disturbed with development. However, Sites 1 (Lester), 22 (Merritt), and 27 (PUSD-Vineyard) may have only been minimally disturbed in the past and are not within the flat valley area.

The General Plan includes policies and programs specifically designed to address potential impacts to archaeological resources. Goal 4 of the Open Space and Conservation Element requires the designation, preservation, and protection of archaeological resources within the Pleasanton Planning Area. Policy 5 mandates the preservation and rehabilitation of cultural resources that are significant because of their age, appearance, or history, and Program 5.1 provides additional requirements for review of applications for development projects. Pursuant to Program 5.1, in consultation with the NWIC, available information would be used to determine whether an archaeology study, construction monitoring, or other mitigations are appropriate on a project –by- project basis. Program 5.2 requires recommendations contained in archaeological architectural studies regarding rehabilitation or preservation of historically archaeological structures and sites to be followed. Program 5.3 requires the cessation of all construction and grading activities within the vicinity of any discovered prehistoric or historic artifacts, or other indications of cultural resources, until any such find is evaluated by a qualified professional Archaeologist, and appropriate mitigation is approved by the City.

³⁰ City of Pleasanton. 2011. City of Pleasanton Housing Element and Climate Action Plan General Plan Amendment and Rezonings Draft Supplemental Environmental Impact Report. September.

With respect to Site 27 (PUSD-Vineyard), the Vineyard Avenue Corridor Specific Plan includes Policy 1 with the intent of addressing the conservation and protection of historical resources, and Policy 1 requires work to be halted if prehistoric artifacts or other indications of cultural resources are found once project construction is underway until a qualified Archaeologist has been consulted.

As the City receives development applications for subsequent development consistent with the Housing Element Update, those applications would be reviewed by the City for compliance with the policies and programs of the General Plan as well as the regulations of the Municipal Code related to archaeological resources.

In conclusion, development consistent with the Housing Element Update could result in new development that could affect known or previously unidentified archaeological resources within the potential sites for rezoning. However, compliance with applicable current federal, State, and local laws as well as General Plan and Vineyard Avenue Corridor Specific Plan policies and programs and the regulations of the Municipal Code would ensure that future development projects are appropriately reviewed and designed in terms of potential impacts to archaeological resources. Consistent with the General Plan policies and programs, individual development projects would be required to undergo project-specific environmental review, which may require additional site-specific or project-specific measures to reduce any potential impacts and would ensure that impacts remain less than significant.

Level of Significance

Less than significant impact.

Burial Sites

Impact CUL-3: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not disturb human remains, including those interred outside of formal cemeteries.

Excavation and construction activities consistent with the Housing Element Update may uncover human remains that may not be marked in formal burial locations. The General Plan includes policies and programs intended to conserve and reduce impacts to archaeological resources, including human remains. Goal 4 of the Open Space and Conservation Element requires the designation, preservation, and protection of archaeological resources, including burial sites. Program 5.3 requires the cessation of all construction and grading activities within the vicinity of any discovered prehistoric or historic artifacts, including burial sites, until any such find is evaluated by a qualified professional Archaeologist and appropriate mitigation is approved by the City.

With respect to Site 27 (PUSD-Vineyard), as set forth by Policy 2 in the Vineyard Avenue Corridor Specific Plan, in the event of discovery or recognition of any human remains on-site, there shall be no further excavation or disturbance of the site or any nearby area reasonably suspected to overlie adjacent remains until the county coroner has determined, in accordance with any laws concerning investigation of the circumstances, the manner or the cause of death and has made recommendation concerning treatment and disposition of the human remains to the person responsible for the excavation or to his or her authorized representative.

In the unlikely event human remains are discovered, Public Resources Code Section 5097 identifies specific stop-work and notification procedures to follow when Native American human remains are inadvertently discovered during excavation and construction activities. In addition, in the event of the accidental discovery or recognition of any human remains, CEQA Guidelines Section 15064.5(d)—Effects on Human Remains, Health and Safety Code Section 7050.5, and Public Resources Code Sections 5097.94 and Section 5097.98 must be followed. These requirements apply to all construction projects within the potential sites for rezoning.

Implementation of policies and programs in the General Plan and the Vineyard Avenue Corridor Specific Plan and compliance with applicable current State, federal and local regulations would ensure that future development consistent with the Housing Element Update would not result in significant adverse effects to human remains. Therefore, impacts would be less than significant.

Level of Significance

Less than significant impact.

Listed or Eligible Tribal Cultural Resources

Impact CUL-4: **Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not cause a substantial adverse change in the significance of a Tribal Cultural Resource that is listed or eligible for listing in the California Register of Historical Resources, or in a local register of historical resources as defined in Public Resources Code Section 5020.1(k).**

On February 25, 2022, a letter was sent to the NAHC to determine whether any sacred sites are listed on its Sacred Lands File for the potential sites for housing. A response was received on April 6, 2022, indicating the search returned negative results for TCRs within the potential sites for housing (see Appendix E). It is always possible that subsurface excavation activities may encounter previously undiscovered TCRs. Therefore, potential unidentified eligible TCRs could be adversely affected by development consistent with the Housing Element Update could create a potentially significant impact.

While the Housing Element Update does not directly propose any adverse changes to any recorded TCRs, future development consistent with the Housing Element Update could affect known or previously unidentified TCRs. In addition, the potential for additional undiscovered eligible TCRs to be present within the potential sites for housing exists but varies by location.

The General Plan includes policies and programs intended to conserve and reduce impacts to TCRs. For example, Program 5.5 of the Open Space and Conservation Element encourages the use of educational workshop, exhibits, and teaching materials that celebrate the city's history, ancestral heritage, and Native American contributions and encourages participation by Native American groups in developing such programs. The General Plan and Municipal Code also include policies and programs intended to conserve and reduce impacts to archaeological resources, which can include TCRs, as described in Impact CUL-1.

With implementation of policies and programs in the General Plan, Vineyard Avenue Corridor Specific Plan, as well as compliance with applicable current State, federal and local regulations,

including, but not limited to SB 18 and AB 52, potential impacts to existing or undiscovered eligible TCRs within the potential sites for housing would be less than significant.

Level of Significance

Less than significant impact.

Lead Agency Determined Tribal Cultural Resources

Impact CUL-5: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not cause a substantial adverse change in significance of a Tribal Cultural Resource determined by the lead agency, in its discretion and supported by substantial evidence, to be significant pursuant to the criteria set forth in subdivision (c) of Public Resources Code Section 5024.1.

On February 25, 2022, a letter was sent to the NAHC to determine whether any sacred sites are listed on its Sacred Lands File for the potential sites for housing. A response was received on April 6, 2022, indicating the search returned negative results for TCRs within the potential sites for housing and recommended contacting tribal representatives from seven tribes for additional information (see Appendix E).

On April 20, 2022, in accordance with requirements promulgated by SB 18 and AB 52, the City notified the Amah Mutsun Tribal Band, the Coastanoan Rumsen Carmel Tribe, the Indian Canyon Mutsun Band, the Muwekma Ohlone Indian Tribe of San Francisco Bay, the North Valley Yokuts Tribe, the Ohlone Indian Tribe, and Wilton Rancheria of the Housing Element Update and invited the tribes to participate in consultation (see Appendix E). To date, no responses have been received.

At this time, the City, in its capacity as lead agency, has not identified TCRs on the potential sites for housing pursuant to criteria set forth in subdivision (c) of Public Resources Code Section 5024.1 that would be adversely impacted by the Housing Element Update. Nonetheless, as described under Impact CUL-4, future development consistent with the Housing Element Update could affect previously unidentified TCRs.

As discussed under Impact CUL-1 through Impact CUL-4, the General Plan includes policies and programs to conserve and reduce impacts to TCRs, such as Policy 5 and Programs 5.1, 5.2, and 5.3. Additionally, Policy 1 of the Vineyard Avenue Corridor Specific Plan minimizes impacts to TCRs. By adhering to the policies and actions in the General Plan, the Vineyard Avenue Corridor Specific Plan, and applicable current State, federal and local regulations, including, but not limited to, SB 18 and AB 52, potential impacts to existing or undiscovered eligible TCRs within the potential sites for housing would be reduced to less than significant.

Level of Significance

Less than significant impact.

3.4.5 - Cumulative Impacts

The geographic scope of the cumulative impact analysis for cultural resources and TCRs is the Tri-Valley Planning Area, which includes the City of Pleasanton as well as the surrounding Cities of

Dublin, Livermore, and San Ramon and the Town of Danville. This analysis evaluates whether the impacts associated with development consistent with the Housing Element Update, together with the impacts of cumulative development, would result in a cumulatively significant impact on cultural resources and TCRs. This analysis then considers whether incremental contribution to cumulative impacts associated with development consistent with the Housing Element Update would be significant. Both conditions must apply for a project's cumulative effects to rise to the level of significance.

Future development within the cumulative geographic scope could have significant cumulative impacts on known or previously unidentified cultural resources and TCRs. However, development within the cumulative geographic context would be required to comply with federal, State, and local laws and policies that protect cultural resources and TCRs, including the provisions of SB 18 and AB 52, Section 15064.5 of the CEQA Guidelines, Section 7050.5 of the California Health and Safety Code, and Sections 5024.1 and 5097 of the Public Resources Code. Compliance with these policies may also require development projects to prepare site-specific project-level analysis to fulfill CEQA requirements, which would include additional consultation that could lead to the identification of potential site-specific cultural resources and TCRs. Accordingly, because cumulative development would be required to comply with long-term planning documents, and regulatory agency policies (including, but not limited to, evaluation requirements and inadvertent discovery procedures) that would reduce impacts to potential cultural resources and TCRs, cumulative impacts would be less than significant.

Moreover, the Housing Element Update's incremental contribution to these less than significant cumulative impacts would not be significant with implementation of the policies and programs included in the General Plan, the Vineyard Avenue Corridor Specific Plan, and the Municipal Code intended to conserve and reduce impacts to cultural resources and TCRs as outlined in Impacts CUL-1 through CUL-5. In addition, as discussed under Impacts CUL-1 through CUL-5, as the City receives development applications for subsequent development consistent with the Housing Element Update, those applications would be reviewed by the City for compliance with the policies and programs of the General Plan, the provisions of SB 18 and AB 52, the Municipal Code, and other relevant federal, State, and local regulations that protect cultural resources and TCRs, including Section 15064.5 of the CEQA Guidelines and Sections 5024.1 and 5097 of the Public Resources Code. For these reasons, the Housing Element Update's incremental contribution to the less than significant cumulative impacts would be considered less than significant.

Level of Cumulative Significance

Less than significant impact.

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3.5 - Energy

3.5.1 - Introduction

This section of the Draft Program Environmental Impact Report (Draft Program EIR) is intended to provide an overall perspective on energy consumption to address the requirement in the California Environmental Quality Act (CEQA), Public Resources Section 21100(b)(3) that an EIR include mitigation measures that are proposed to reduce the wasteful, inefficient, and unnecessary consumption of energy. This section contains an analysis of the potentially significant energy implications outlined in State CEQA Guidelines, Appendix F, as relevant and applicable to implementation of the proposed 2023-2031 (6th Cycle) Housing Element Update, rezonings, General Plan and Specific Plan Amendments (collectively referred to herein as the Housing Element Update). Future projects consistent with the Housing Element Update will be evaluated for project-specific impacts related to energy at the time they are proposed.

Once the Housing Element Update is adopted, the General Plan would be amended to include the Housing Element Update. Therefore, all references to the General Plan include the Housing Element Update

3.5.2 - Existing Setting

Energy Basics

Energy use, especially through fossil fuel consumption and combustion, relates directly to environmental quality since it can have the potential to adversely affect air quality and generate greenhouse gas (GHG) emissions that may contribute to climate change. Electrical power is generated through a variety of sources, including fossil fuel combustion, hydropower, wind, solar, biofuels, and others. Natural gas is widely used to heat buildings, prepare food in restaurants and residences, and fuel vehicles, among other uses. Fuel use for transportation is related to the fuel efficiency of cars, trucks, and public transportation, choice of different travel modes such as automobile, carpool, and public transit, and miles traveled by these modes, and generally based on petroleum-based fuels such as diesel and gasoline. Electric vehicles (EVs) may not have any direct emissions but do have indirect emissions via the source of electricity generated to power the vehicle. Construction and routine operation and maintenance of infrastructure also consume energy.

Energy is generally transmitted either in the form of electricity, measured in kilowatts (kW)¹ or megawatts (MW),² or natural gas, measured in British Thermal Units (BTU), cubic feet, or US therms.³ Fuel, such as gasoline or diesel, is measured in gallons or liters.

¹ 1 kW = 1,000 watts; A watt is a derived unit of power that measure rate of energy conversion. 1 watt is equivalent to work being done at a rate of 1 joule of energy per second. In electrical terms, 1 watt is the power dissipated by a current of 1 ampere flowing across a resistance of 1 volt.

² 1 MW = 1 million watts

³ One US therm is a unit for quantity of heat that equals one cubic foot of natural gas, or 100,000 British thermal units. A British thermal unit is the quantity of heat required to raise the temperature of 1 pound of liquid water 1 degree Fahrenheit at a constant pressure of 1 atmosphere.

Electricity

Electricity is used primarily for lighting, appliances, and other uses. Trends over the past several decades have resulted in an increase in the use of electric power, especially for new homes. Electric power for new homes is used to for electric spacing heating, electric water heating, electric cooking, and electric clothes drying.

Natural Gas

Natural gas is used primarily for heating, water heating, and cooking purposes and is typically associated with commercial and residential uses.

Fuel

Fuel is used primarily for powering off-road equipment, trucks, and passenger vehicles. The typical fuel types used are diesel and gasoline.

Electricity Generation, Distribution, and Use

State of California

According to the California Energy Commission (CEC), in 2020, the State of California generated approximately 190,913 gigawatt-hours (GWh) of electricity.⁴ Approximately 48.4 percent of this energy generation was sourced from natural gas, 33.4 percent from renewable sources (i.e., solar, wind, and geothermal), 9.4 percent from large hydroelectric sources, and the remaining 8.8 percent was sourced from coal, nuclear, oil, and other non-renewable sources. Additionally, California imported 81,663 GWh of electricity from other states in 2020.

According to the United States Energy Information Administration (EIA),⁵ in 2021, California ranked fourth in electricity production, fourth in the nation in conventional hydroelectric generation, and first as a producer of electricity from solar, geothermal, and biomass resources. California leads the nation in solar thermal electricity capacity and generation.

Electricity and natural gas are distributed through the various electric load-serving entities (LSEs) in California. These entities include investor-owned utilities (IOUs), publicly owned LSEs, rural electric cooperatives, community choice aggregators, and electric service providers.⁶

Alameda County

The CEC's energy consumption database was utilized to identify baseline per capita electricity consumption in the city. As the CEC's energy consumption database only provides energy consumption data at the county-level, the county per capita electricity consumption is presented herein to represent the City's current per capita consumption. Alameda County's annual electricity

⁴ California Energy Commission (CEC). 2021 Total System Electric Generation. Website: <https://www.energy.ca.gov/data-reports/energy-almanac/california-electricity-data/2020-total-system-electric-generation>. Accessed July 29, 2022.

⁵ United States Energy Information Administration (EIA). 2022. California State Profile and Energy Estimates. Website: <https://www.eia.gov/state/?sid=CA>. Accessed July 29, 2022.

⁶ California Energy Commission (CEC). 2022. Electric Load-Serving Entities (LSEs) in California. Website: <https://www.energy.ca.gov/data-reports/energy-almanac/california-electricity-data/electric-load-serving-entities-lses>. Accessed August 29, 2022.

consumption in 2020 was an estimated 10,247.4 GWh.⁷ With a population of 1,663,114 people in 2020,⁸ Alameda County's per capita electricity consumption is estimated at 6,162 kWh.

East Bay Community Energy (EBCE) provides electricity to the City of Pleasanton (City); Pacific Gas and Electric Company (PG&E) provides the transmission lines to distribute the electricity and provides gas service. Residential customers default into EBCE's Renewable 100, which offers 100 percent renewable energy sourced from California wind and solar facilities.⁹ As of 2022, approximately 3 percent of non-residential and approximately 6 percent of residential customers opt out of EBCE's Renewable 100 program.¹⁰

Natural Gas Generation, Distribution, and Use

State of California

Natural gas as an energy resource has several applications but is most commonly associated with cooking appliance use, electricity generation, and space and water heating. According to the CEC, in 2012 total natural gas demand in California for industrial, residential, commercial, and electric power generation was 2,313 billion cubic feet per year (BCF/year), up from 2,196 BCF/year in 2010.¹¹ Demand in all sectors except electric power generation remained relatively flat for the last decade due in large part to energy efficiency measures, but demand for power generation rose about 30 percent between 2011 and 2012. In 2019, it was estimated that California consumed 2,218.7 trillion BTU of natural gas.¹²

Natural gas-fired generation has become the dominant source of electricity in California, as it fuels about 43 percent of electricity consumption followed by hydroelectric power. Because natural gas is a resource that provides load when the availability of hydroelectric power generation and/or other sources decrease, use varies greatly from year to year. The availability of hydroelectric resources, the emergence of renewable resources for electricity generation, and overall consumer demand are the variables that shape natural gas use in electric generation. Because of above average precipitation in 2011, natural gas used for electricity generation was 617 BCF, compared to lower precipitation years in 2010 and 2012 when gas use for electric generation was 736 BCF and 855 BCF, respectively.

Alameda County

EBCE provides electricity to the City of Pleasanton (City); PG&E provides the transmission lines to distribute the electricity and provides gas. Similar to electricity consumption, the CEC's energy

⁷ California Energy Commission (CEC). 2022. Electricity Consumption by County. Website: <http://www.ecdms.energy.ca.gov/elecbycounty.aspx>. Accessed July 29, 2022.

⁸ California Department of Finance (CDF). E-5 Population and Housing Estimates for Cities, Counties, and the State, 2020-2022. Website: <https://dof.ca.gov/forecasting/demographics/estimates/e-5-population-and-housing-estimates-for-cities-counties-and-the-state-2020-2022/>. Accessed August 29, 2022.

⁹ City of Pleasanton. 2022. East Bay Community Energy. Website: [https://www.cityofpleasantonca.gov/gov/hottopics/east_bay_community_energy.asp#:~:text=Starting%20January%202022%2C%20the%20default,California%20wind%20and%20solar%20facilities](https://www.cityofpleasantonca.gov/gov/hottopics/east_bay_community_energy.asp#:~:text=Starting%20January%202022%2C%20the%20default,California%20wind%20and%20solar%20facilities.). Accessed September 28, 2022.

¹⁰ Campbell, Megan. Associate Planner, City of Pleasanton Community Development Department. Personal communication: email. October 18, 2022.

¹¹ California Energy Commission (CEC). 2021. Supply and Demand of Natural Gas in California. Website: <https://www.energy.ca.gov/data-reports/energy-almanac/californias-natural-gas-market/supply-and-demand-natural-gas-california>. Accessed July 29, 2022.

¹² United States Energy Information Administration (EIA). 2019. California Energy Consumption Estimates. Website: <https://www.eia.gov/state/print.php?sid=CA>. Accessed July 29, 2022.

consumption database was utilized to identify baseline per capita natural gas consumption in the city. As the CEC's energy consumption database only provides energy consumption data at the county-level, the county per capita natural gas consumption is presented herein to represent the city's current per capita consumption. Alameda County's annual residential natural gas consumption in 2020 totaled 216.6 million of therms.¹³ With a population of 1,663,114 in 2020,¹⁴ Alameda County had an annual per capita natural gas consumption of 130 therms, or approximately 13 Million Metric BTU (MMBTU) in 2020.

Transportation Fuel Use

State of California

The main category of fuel use in California is transportation fuel, specifically gasoline and diesel. Gasoline is the most used transportation fuel in California, with 97 percent of all gasoline sold in California being consumed by light-duty cars, pickup trucks, and sport utility vehicles. Diesel is the second largest transportation fuel used in California. Nearly all heavy-duty trucks, delivery vehicles, buses, trains, ships, boats and barges, farm, construction and heavy-duty military vehicles and equipment have diesel engines. In year 2020, it was estimated that 12.57 billion gallons of gasoline and 2.98 billion gallons of diesel were sold in California.¹⁵

Alternative Fuels

A variety of alternative fuels are used to reduce petroleum-based fuel demand. The use of these fuels is encouraged through various Statewide regulations and plans, such as the Low Carbon Fuel Standard (LCFS) and Senate Bill (SB) 32. Conventional gasoline and diesel may be replaced, depending on the vehicle's capability, with transportation fuels including hydrogen, biodiesel, and electricity. Currently, 47 public hydrogen refueling stations and 18 public biodiesel refueling stations exist in California; however, none are in the city.¹⁶

Electric Vehicles

Electricity can be used to power electric and plug-in hybrid EVs directly from the power grid. Electricity used to power vehicles is generally provided by the electricity grid and stored in the vehicle's batteries. Fuel cells are being explored to use electricity generated onboard the vehicle to power electric motors. Currently, California has more than 13,600 EV charging stations, and there are approximately 180 charging stations within the city.¹⁷

¹³ California Energy Commission (CEC). Natural Gas Consumption by County. Website: <http://www.ecdms.energy.ca.gov/gasbycounty.aspx>. Accessed July 29, 2022.

¹⁴ California Department of Finance (CDF). Population Estimates for Cities, Counties, and the State. Website: <https://dof.ca.gov/forecasting/demographics/estimates/e-5-population-and-housing-estimates-for-cities-counties-and-the-state-2020-2022/>. Accessed August 29, 2022.

¹⁵ California Energy Commission (CEC). 2020. A15 Report Responses vs. California Department of Tax and Fee Administration. Website: <https://www.energy.ca.gov/data-reports/energy-almanac/transportation-energy/california-retail-fuel-outlet-annual-reporting#notes>. Accessed July 29, 2022.

¹⁶ United States Department of Energy (DOE), Alternative Fuels Data Center. 2022. Alternative Fueling Station Locator [Interactive Database]. Website: <https://afdc.energy.gov/stations/#/find/nearest>. Accessed July 29, 2022.

¹⁷ Ibid.

3.5.3 - Regulatory Framework

Federal Regulations

Energy Independence and Security Act

The Energy Policy Act of 2005 created the Renewable Fuel Standard Program. The Energy Independence and Security Act of 2007 expanded this program by:

- Expanding the Renewable Fuel Standard Program to include diesel in addition to gasoline.
- Increasing the volume of renewable fuel required to be blended into transportation fuel from 9 billion gallons in 2008 to 36 billion gallons by 2022.
- Establishing new categories of renewable fuel, and setting separate volume requirements for each one.
- Requiring the United States Environmental Protection Agency (EPA) to apply lifecycle GHG emission threshold standards to ensure that each category of renewable fuel emits fewer GHGs than the petroleum fuel it replaces.

This expanded Renewable Fuel Standard Program lays the foundation for achieving substantial reductions of GHG emissions from the use of renewable fuels, reducing the use of imported petroleum, and encouraging the development and expansion of the nation's renewable fuels sector.

Signed on December 19, 2007, the Energy Independence and Security Act of 2007 (EISA) aims to:

- Move the United States toward greater energy independence and security.
- Increase the production of clean renewable fuels.
- Protect consumers.
- Increase the efficiency of products, buildings, and vehicles.
- Promote research on and deploy GHG capture and storage options.
- Improve the energy performance of the federal government.
- Increase U.S. energy security, develop renewable fuel production, and improve vehicle fuel economy.

EISA reinforces the energy reduction goals for federal agencies put forth in Executive Order 13423, as well as introduces more aggressive requirements. The three key provisions enacted are the Corporate Average Fuel Economy Standards, the Renewable Fuel Standard Program, and the appliance/lighting efficiency standards.

The EPA is committed to developing, implementing, and revising both regulations and voluntary programs under the following subtitles in EISA, among others:¹⁸

- Increased Corporate Average Fuel Economy Standards
- Federal Vehicle Fleets

¹⁸ United States Environment Protection Agency (EPA). 2022. Summary of the Energy Independence and Security Act. Website: <https://www.epa.gov/laws-regulations/summary-energy-independence-and-security-act>. Accessed July 29, 2022.

- Renewable Fuel Standard
- Biofuels Infrastructure
- Carbon Capture and Sequestration

EPA and National Highway Traffic Safety Administration Light-Duty Vehicle Greenhouse Gas Emission Standards and Corporate Average Fuel Economy Standards Final Rule

Congress first passed the Corporate Average Fuel Economy law in 1975 to increase the fuel economy of cars and light-duty trucks. The law has become more stringent over time. On May 19, 2009, former President Barack Obama put in motion a new national policy to increase fuel economy for all new cars and trucks sold in the United States. On April 1, 2010, the EPA and the United States Department of Transportation’s National Highway Traffic Safety Administration (NHTSA) announced a joint final rule establishing a national program that would reduce GHG emissions and improve fuel economy for new cars and trucks sold in the United States.

The first phase of the national program applied to passenger cars, light-duty trucks, and medium duty passenger vehicles, covering model years 2012 through 2016. They required these vehicles to meet an estimated combined average emissions level of 250 grams of carbon dioxide (CO₂) per mile, equivalent to 35.5 miles per gallon if the automobile industry met this CO₂ level solely through fuel economy improvements. Together, these standards would have cut CO₂ emissions by an estimated 960 million metric tons and 1.8 billion barrels of oil over the lifetime of the vehicles sold under the program (model years 2012-2016).

The EPA and the NHTSA issued final rules on a second phase joint rulemaking, establishing national standards for light-duty vehicles for model years 2017 through 2025 in August 2012.¹⁹ The new standards for model years 2017 through 2025 apply to passenger cars, light-duty trucks, and medium duty passenger vehicles. The final standards are projected to result in an average industry fleet wide level of 163 grams/mile of CO₂ in model year 2025, which is equivalent to 54.5 miles per gallon if achieved exclusively through fuel economy improvements.

The EPA and NHTSA issued final rules for the first national standards to reduce GHG emissions and improve fuel efficiency of heavy-duty trucks and buses on September 15, 2011, which became effective November 14, 2011. For combination tractors, the agencies proposed engine and vehicle standards that began in the 2014 model year and would have achieved up to a 20 percent reduction in CO₂ emissions and fuel consumption by the 2018 model year. For heavy-duty pickup trucks and vans, the agencies proposed separate gasoline and diesel truck standards, which were to be phased in starting in the 2014 model year and would achieve up to a 10 percent reduction for gasoline vehicles, and a 15 percent reduction for diesel vehicles by 2018 model year (12 and 17 percent respectively if accounting for air conditioning leakage). Lastly, for vocational vehicles, the engine and vehicle standards would have achieved up to a 10 percent reduction in fuel consumption and CO₂ emissions from the 2014 to 2018 model years.

¹⁹ United States Environmental Protection Agency (EPA). 2012. EPA and NHTSA Set Standards to Reduce Greenhouse Gases and Improve Fuel Economy for Model Years 2017-2025 Cars and Light Trucks. Website: <https://www.nhtsa.gov/document/fact-sheet-epa-and-nhtsa-propose-standards-reduce-greenhouse-gas-emissions-and-improve>. Accessed July 29, 2022.

The State of California has received a waiver from the EPA to have separate, stricter Corporate Average Fuel Economy Standards. Although global climate change did not become an international concern until the 1980s, efforts to reduce energy consumption began in California in response to the oil crisis in the 1970s, resulting in the incidental reduction of GHG emissions. To manage the State's energy needs and promote energy efficiency, Assembly Bill (AB) 1575 created the CEC in 1975.

State Regulations

California Assembly Bill 1493: Pavley Regulations and Fuel Efficiency Standards

California AB 1493, enacted on July 22, 2002, required the California Air Resources Board (ARB) to develop and adopt regulations that reduce GHGs emitted by passenger vehicles and light-duty trucks. Implementation of the regulation was delayed by lawsuits filed by automakers and by the EPA's denial of an implementation waiver. The EPA subsequently granted the requested waiver in 2009, which was upheld by the by the U.S. District Court for the District of Columbia in 2011.²⁰

The standards were to be phased in during the 2009 through 2016 model years. When fully phased in, the near-term (2009–2012) standards were to result in an approximately 22 percent reduction compared with the 2002 fleet, and the mid-term (2013–2016) standards were to result in about a 30 percent reduction.

The second phase of the implementation for the Pavley Bill was incorporated into amendments to the Low Emission Vehicle (LEV) Program referred to as LEV III or the Advanced Clean Cars program. The Advanced Clean Car program combines the control of smog-causing pollutants and GHG emissions into a single coordinated package of requirements for model years 2017 through 2025. The regulation will reduce GHGs from new cars by 34 percent from 2016 levels by 2025. The new rules will reduce pollutants from gasoline and diesel-powered cars, and deliver increasing numbers of zero-emission technologies, such as full battery electric cars, newly emerging plug-in hybrid EVs and hydrogen fuel cell cars. The regulations will also ensure adequate fueling infrastructure is available for the increasing numbers of hydrogen fuel cell vehicles planned for deployment in California.²¹

California Code of Regulations Title 13: Motor Vehicles

California Code of Regulations, Title 13: Division 3, Chapter 10, Article 1, Section 2485: Airborne Toxic Control Measure to Limit Diesel-Fueled Commercial Motor Vehicle Idling. This measure seeks to reduce public exposure to diesel particulate matter and other air contaminants by establishing idling restrictions, emission standards, and other requirements for heavy-duty diesel engines and alternative idle reduction technologies to limit the idling of diesel-fueled commercial motor vehicles. Any person that owns, operates, or causes to operate any diesel-fueled commercial motor vehicle must not allow a vehicle to idle for more than 5 consecutive minutes at any location, or operate a diesel-fueled auxiliary power system for greater than 5 minutes at any location when within 100 feet of a restricted area. A

²⁰ California Legislative Information. 2002. Clean Car Standards—Pavley, Assembly Bill 1493. Website: https://leginfo.ca.gov/faces/billNavClient.xhtml?bill_id=200120020AB1493. Accessed July 29, 2022.

²¹ California Air Resources Board (ARB). 2013. Final 2017 Scoping Plan and Appendices.

restricted area is any real property zoned for individual or multi-family housing units, schools, hotels, motels, hospitals, senior care facilities or child care facilities, that has one or more of such units on it.²²

California Code of Regulations, Title 13: Division 3, Chapter 9, Article 4.8, Section 2449: General Requirements for In-Use Off-Road Diesel-Fueled Fleets.

This measure regulates oxides of nitrogen (NO_x), diesel particulate matter (DPM), and other criteria pollutant emissions from in-use off-road diesel-fueled vehicles. This measure also requires each fleet to meet fleet average requirements or demonstrate that it has met “best available control technology” requirements. Additionally, this measure requires medium and large fleets to have a written idling policy that is made available to operators of the vehicles informing them that idling is limited to 5 consecutive minutes or less.

California Senate Bill 1078: Renewable Electricity Standards

On September 12, 2002, former Governor Gray Davis signed SB 1078, requiring California to generate 20 percent of its electricity from renewable energy by 2017. SB 1078 changed the due date to 2010 instead of 2017. On November 17, 2008, former Governor Arnold Schwarzenegger signed Executive Order S-14-08, which established a Renewable Portfolio Standard target for California requiring that all retail sellers of electricity serve 33 percent of their load with renewable energy by 2020. Former Governor Schwarzenegger also directed the ARB (Executive Order S-21-09) to adopt a regulation by July 31, 2010, requiring the State’s LSEs to meet a 33 percent renewable energy target by 2020. The ARB Board approved the Renewable Electricity Standard on September 23, 2010, by Resolution 10-23.

California Senate Bill 350: Clean Energy and Pollution Reduction Act

SB 350 (2015) reaffirms California’s commitment to reducing its GHG emissions and addressing climate change. Key provisions include an increase in the Renewable Portfolio Standard (RPS), higher energy efficiency requirements for buildings, initial strategies toward a regional electricity grid, and improved infrastructure for electric vehicle charging stations. Specifically, SB 350 requires the following to reduce Statewide GHG emissions:²³

- Increase the amount of electricity procured from renewable energy sources from 33 percent to 50 percent by 2030, with interim targets of 40 percent by 2024, and 25 percent by 2027.
- Double the energy efficiency in existing buildings by 2030. This target will be achieved through the California Public Utility Commission, the CEC, and local publicly owned utilities.
- Reorganize the Independent System Operator (ISO) to develop more regional electrify transmission markets and to improve accessibility in these markets, which will facilitate the growth of renewable energy markets in the western United States.

²² Cornell Law School. California Code of Regulations. Title 13, Section 2485 - Airborne Toxic Control Measure to Limit Diesel-Fueled Commercial Motor Vehicle Idling. Website: <https://www.law.cornell.edu/regulations/california/13-CCR-2485>. Accessed September 28, 2022.

²³ California Legislative Information. 2015. Senate Bill 350 Clean Energy and Pollution Reduction Act of 2015. Website: https://leginfo.ca.gov/faces/billNavClient.xhtml?bill_id=201520160SB350. Accessed July 29, 2022.

California Senate Bill 100: Renewable Portfolio Standard Program

On September 10, 2018, Governor Newsom signed SB 100, requiring California electricity utility providers to supply all in-state end users with electricity sourced from renewable sources. Specifically, SB 100 accelerates the goals expressed under SB 1078 and requires that the program achieve 50 percent of electricity sourced from renewables by December 31, 2026, 60 percent by December 31, 2030, and 100 percent of electricity sourced from carbon-free sources by December 31, 2045. For clarification, renewable sources, as described herein, includes all renewable sources (e.g., solar, small hydro, wind) but notably omits large-scale hydroelectric and nuclear electricity generation; carbon-free sources include all renewable sources as well as large-scale hydroelectric and nuclear electricity generation.

Executive Order N-79-20

Executive Order N-79-20 directs the State to require that, by 2035, all new cars and passenger trucks sold in California be Zero-Emission Vehicles (ZEVs).²⁴

ARB Advanced Clean Cars II rule

Adopted by the ARB in August 2022, the Advanced Clean Cars II regulation supports the implementation of Executive Order N-79-20 and requires that by 2035, all new passenger cars, trucks and SUVs sold in California will be zero emissions.²⁵

California Code of Regulations Title 24

Part 6 (Energy Efficiency Standards for Residential and Nonresidential Buildings)

California Code of Regulations, Title 24, Part 6 (California's Energy Efficiency Standards for Residential and Nonresidential Buildings), was first adopted in 1978 in response to a legislative mandate to reduce California's energy consumption. The standards are updated periodically to allow consideration and possible incorporation of new energy efficient technologies and methods. Energy efficient buildings require less electricity; therefore, increased energy efficiency reduces fossil fuel consumption and decreases GHG emissions. The 2019 Building Energy Efficiency Standards went into effect on January 1, 2020.²⁶ CEC recently approved the latest 2022 Energy Code, which will become effective on January 1, 2023.²⁷

Part 11 (California Green Building Standards Code)

California Code of Regulations, Title 24, Part 11, is a comprehensive and uniform regulatory code for all residential, commercial, and school buildings that went in effect January 1, 2011. The code is updated on a regular basis, with the most recent update consisting of the 2019 California Green Building Standards Code (CALGreen) that became effective January 1, 2020. CEC recently approved

²⁴ Office of Governor Gavin Newsom. 2022. Executive Order N-79-20. Governor Newsom Announces California Will Phase Out Gasoline-Powered Cars & Drastically Reduce Demand for Fossil Fuel in California's Fight Against Climate Change. Website: <https://www.gov.ca.gov/2020/09/23/governor-newsom-announces-california-will-phase-out-gasoline-powered-cars-drastically-reduce-demand-for-fossil-fuel-in-californias-fight-against-climate-change/>. Accessed October 3, 2022.

²⁵ California Air Resources Board (ARB). 2022. Advanced Clean Cars II. Website: <https://ww2.arb.ca.gov/our-work/programs/advanced-clean-cars-program/advanced-clean-cars-ii>. Accessed October 3, 2022.

²⁶ California Energy Commission (CEC). 2019. Building Energy Efficiency Standards. <https://www.energy.ca.gov/programs-and-topics/programs/building-energy-efficiency-standards/2019-building-energy-efficiency>. Accessed July 29, 2022.

²⁷ California Energy Commission (CEC). 2021. 2022 Building Energy Efficiency Standards. Website: <https://www.energy.ca.gov/programs-and-topics/programs/building-energy-efficiency-standards/2022-building-energy-efficiency>. Accessed September 2, 2022.

the latest 2022 CALGreen Code, which will become effective on January 1, 2023.²⁸ Local jurisdictions are permitted to adopt more stringent requirements,²⁹ as State law provides methods for local enhancements. CALGreen recognizes that many jurisdictions have developed existing construction and demolition ordinances, and defers to them as the ruling guidance provided, they provide a minimum 50 percent diversion requirement. CALGreen also provides exemptions for areas not served by construction and demolition recycling infrastructure. The California Building Standards Code (CBC) provides the minimum standard that buildings need to meet in order to be certified for occupancy, which is generally enforced by the local building official.

California Public Utilities Code

The California Public Utilities Commission (CPUC) regulates privately owned telecommunication, electric, natural gas, water, railroad, rail transit, and passenger transportation companies. It is the responsibility of the CPUC to (1) assure California utility customers safe, reliable utility service at reasonable rates; (2) protect utility customers from fraud; and (3) promote a healthy California economy. The Public Utilities Code, adopted by the legislature, defines the jurisdiction of the CPUC.

Local

City of Pleasanton

City of Pleasanton General Plan

The Pleasanton General Plan 2005-2025 was adopted in year 2009 and was last amended in August 2019. The General Plan is developed to guide the long-range development of land and the conservation of resources in the city.³⁰ The Energy Element of the General Plan sets forth the following goals and policies to conserve energy and promote sustainability”

City Leadership in Energy Sustainability

Goal 1 Move toward a sustainable energy future that increases renewable energy use, energy conservation, energy efficiency, energy self-sufficiency, and limits energy-related financial burdens in Pleasanton.

Policy 1 Reduce the City government’s energy demand.

Program 1.1 Develop a comprehensive program to reduce City government energy consumption. As part of this program explore ways to designate one or more City employees, as determined by the City Manager, to be responsible for energy conservation efforts.

Program 1.2 Make the City a model by increasing the insulation and weatherization of its facilities, whenever possible. In particular, when remodeling City facilities, the City should increase insulation and weatherization.

²⁸ California Energy Commission (CEC). 2021. CEC Approves 2022 CALGreen Building Standards Code. Website: <http://calenergycommission.blogspot.com/2021/10/cec-approves-2022-calgreen-building.html>. Accessed September 2, 2022.

²⁹ Municipal Code Chapter 17.50 provides green building standards specific to Pleasanton, which are more stringent than what is required by the CALGreen Code.

³⁰ City of Pleasanton. 2009 General Plan 2005-2025. July 21.

- Program 1.3** Improve coordination between the school district and the City regarding the energy management of facilities.
- Program 1.4** Adopt a City “Green Fleet” policy to guide the City in purchasing energy efficient and clean vehicles.
- Program 1.5** Use the most energy efficient lighting, air conditioning, heating, and irrigation systems in City buildings and in landscaping. Use LED lighting, where feasible.
- Program 1.6** Encourage other public agencies within Pleasanton, including the Pleasanton Unified School District, to consider green building practices in all public facility remodels and new construction.

Reducing Demand

- Policy 2** Encourage energy efficiency and the conservation of electricity and natural gas through education.
- Program 2.1** Sponsor energy-related workshops and invite local builders, architects, homeowners, and business owners.
- Program 2.2** Distribute energy-related educational materials to schools, the library, the media, homeowners, and other organizations.
- Program 2.3** Create educational displays on energy conservation in public areas.
- Program 2.4** Display energy conservation and energy efficiency information on the City’s web page.
- Program 2.5** Develop an educational program about conservation, renewable energy sources, public and private energy-related programs, and rebates.
- Program 2.6** Promote using less energy during peak demand periods.
- Program 2.7** Share information about the link between water and electricity use, i.e., reducing water use reduces the need for electricity for water pumping.
- Policy 3** Reduce demand for electricity and natural gas by establishing guidelines, programs, and incentives that would achieve this end.
- Program 3.1** Create incentives for energy efficiency. Continue to support PG&E incentives for conserving energy.
- Program 3.2** Identify where insulation would be most beneficial, and consider developing an incentive program to help owners, including apartment owners, insulate their buildings.

- Program 3.3** Develop a program or a policy that encourages the installation of alternative energy technology in residential, commercial, and public projects.
- Program 3.4** Develop educational materials to assist property owners in implementing energy efficient upgrades.
- Program 3.5** Establish financial incentives (such as fee waivers) to encourage the development of low energy homes.
- Program 3.6** Establish a category of low energy homes under the City’s Growth Management Program and establish a sub-allocation of housing units for this category.
- Policy 4** Reduce heating and cooling energy use in the City.
- Program 4.1** Require a built environment that uses the properties of nature. For example: where feasible, requiring projects to take advantage of shade, prevailing winds, landscaping and sunscreens to reduce energy use; and, requiring projects to use regenerative energy heating and cooling source alternatives to fossil fuels.
- Program: 4.2** Continue to implement parking lot tree planting standards that would substantially cool parking areas and help cool the surrounding environment. Encourage landscaping conducive to solar panels in areas where appropriate.
- Program 4.3** Reduce heat gain and air conditioning demand by requiring light-colored paving material for roads, parking areas, and cool roofs in both new and redeveloped areas when feasible and cost effective.
- Policy 5** Reduce electricity and natural gas demand by entering into partnerships with businesses.
- Program 5.1** Enter into partnerships that would improve energy conservation and/or increase energy efficiency.
- Policy 6** Preserve and strengthen the City’s green building policies and regulations.
- Program 6.1** Better educate the public about green building opportunities.
- Program 6.2** Review the Green Building Ordinance and increase the number of Green Points required, if feasible.
- Program 6.3** Require green building practices to be used in all projects, including those not covered by the mandatory Green Building Ordinance, if feasible.
- Program 6.4** Provide recognition for exemplary green building projects in the form of awards and presentations at Council meetings.

Program 6.5 Continue working with the stakeholders (architects, engineers, builders, property owners) who implement the Green Building Ordinance to ensure that the review and implementation process of the ordinance is working as intended.

Increasing Supply

Policy 7 Promote renewable energy.

Program 7.1 Encourage public and private entities to generate renewable energy.

Program 7.2 Use solar in public facilities and encourage the use of solar in private facilities, where feasible and cost effective.

Program 7.3 Promote and encourage photovoltaic demonstration projects in association with public or private development.

Program 7.4 Study the feasibility of starting or joining a photovoltaic co-op program and explore related financial considerations.

Program 7.5 For new construction, require roofs that are strong enough and have roof truss spacing to hold photovoltaic panels, where feasible and cost effective.

Program 7.6 Require solar water heating and/or photovoltaic-ready roofs in new construction, i.e., roofs with wiring installed for a roof-mounted photovoltaic system, where feasible.

Financial Impacts

Program 10.3 Require the installation of energy efficient lighting.

Program 10.4 Provide a program to publicly commend and acknowledge businesses or individuals that construct or remodel buildings that save more energy than required by Title 24 or by the City's Green Building Ordinance.

Alliances

Policy 13 Join or work with regional energy alliances where there are clear benefits for Pleasanton.

Program 13.2 Work with PG&E to design and locate appropriate expansions of the gas and electric system. See also the policy and programs in the Air Quality Element regarding the City joining International Council for Local Environmental Initiatives – an organization of local governments that takes action on climate protection. Many of these policies and programs would also reduce energy usage.

Transportation Energy

Goal 2 Save transportation energy by implementing a more effective transportation system.

Policy 16 Reduce vehicle fuel consumption in the City.

Program 16.1 Synchronize traffic lights and smooth traffic flow so that gas is not wasted accelerating and decelerating.

Housing Element

The Housing Element is the primary tool used by the State to ensure local governments are appropriately planning for and accommodating enough housing across all income levels for the planning period 2023-2031. The Housing Element is a mandatory part of a jurisdiction's General Plan, but it differs from other General Plan elements in two key aspects: (1) it must be updated every eight years for jurisdictions within an MPO, such as ABAG; and (2) it must also be reviewed and approved by the California Department of Housing and Community Development (HCD) to ensure compliance with statutory requirements. Goals, policies, and programs that support energy conservation in the Housing Element are provided in Chapter 2, Project Description, specifically, Goal 6, Programs 6.2, 6.3, and 6.5 provide guidance that support reducing energy use.

City of Pleasanton Climate Action Plan

The City recently adopted its latest Climate Action Plan (CAP 2.0) in March 2022. The CAP 2.0 sets a target to reduce GHG emissions to 4.1 metric tons of carbon dioxide equivalent (MT CO₂e) per capita by 2030 and work toward per capita carbon neutrality by 2045.³¹ The CAP 2.0 includes the following strategies and actions that would reduce energy consumption as well as GHG emissions.

Transportation and Land Use

Reduce GHG emissions from transportation and land use which will enhance community mobility, improve public health, and result in cost savings.

Strategy TLU-1 The City of Pleasanton will expand existing Zero-Emission Vehicle (ZEV) fueling infrastructure throughout the community and transition the municipal fleet to EVs. Even with shifts toward active and public transportation, many community members in Pleasanton will still own or lease cars due to proximity and convenience. Acknowledging that car use will continue to persist (and perhaps dominate), this strategy is pivotal to reducing Pleasanton's emissions. By engaging the local community, including school districts and regional organizations, the City of Pleasanton will educate key audiences and identify funding partnerships to support the switch to ZEVs (e.g., electric or hydrogen fuel celled vehicles). This switch will not only reduce local GHG emissions, but also improve local air quality—especially near major roadways.

Strategy TLU-2 Advance active, shared, and public transportation. Through continued work to support the Valley Link project and implement the City's Trail Master Plan, Bicycle and Pedestrian Master Plan, and Complete Streets program, the City is actively integrating accessible infrastructure that accommodates multiple modes of transportation. The City will continue to expand bicycle infrastructure, encourage transit ridership, and invest in school programs that reduce VMT for curricular and co-curricular activities. The City's investments in active, shared, and public

³¹ City of Pleasanton. 2022. Final Climate Action Plan 2.0. March.

transportation must expand into all areas of the City and ensure reliable access to alternative transportation options. Convenience, affordability, and ease of use are imperative to the success of alternative transportation programs, as options that are inconvenient and difficult to navigate will likely not be used.

Strategy TLU-3 Advance sustainable land use. Since Pleasanton’s population and job base is expected to increase, General Plan Housing Element implementation and LEED™ ND will be essential to support not only responsible community development but reduce VMT and provide access to active and/or shared transportation. This strategy will prioritize housing near transit and job centers and encourage sustainable land development for new projects that get built. Current hurdles to active and public transit include convenience and accessibility linked to land use patterns in Pleasanton. Some of these issues can be solved for future development through conscious efforts to develop with sustainable principles from plan concept to implementation.

Buildings and Energy

Reduce GHG emissions from buildings and associated energy consumption and increase buildings and energy resilience which will result in cost savings, improved public health, and improved infrastructure.

Strategy BE-1 Advance the decarbonization of buildings. Pleasanton is now participating in EBCE’s Renewable 100 program, ensuring a high degree of Pleasanton is powered by 100 percent renewable energy and that low-income residents have access to discounted programs to keep energy affordable. Shifting from natural gas to electric (e.g., heat sources in homes) in all new and existing buildings will address the biggest remaining source of building emissions—natural gas—and build a foundation for fully transitioning to carbon-free renewable energy. Making the transition to all-electric will support green job creation and improved indoor air quality, as natural gas equipment is replaced, and new buildings are built electric. Paired with increased energy efficiency and small-scale renewable energy and storage, buildings will also become more resilient to fluctuations in energy supply.

Strategy BE-2 Improve energy consumption and efficiency. As the City electrifies buildings to ensure that they are powered with clean, renewable energy, Pleasanton can further reduce energy emissions right away by making homes and buildings more energy efficient. This strategy builds on the City’s progress to date in financing, outreach, and partnerships in support of energy efficiency and conservation. Energy efficiency also has the added benefit of reducing energy bills for residents and businesses. These cost savings are particularly important for lower income residents and renters, who tend to face a disproportionately higher energy burden because they are more likely to live in older, less energy efficient homes and apartment complexes.

Strategy BE-3 Expand use of renewable energy. As the decarbonization strategy works to remove fossil fuel use from our buildings and the energy efficiency strategy works to reduce

overall energy consumption, expanding the use of locally generated renewable energy will increase Pleasanton's general climate and energy resilience. The City will increase local renewable energy generation and storage to reduce reliance on the larger power grid and make the community less susceptible to potential energy shortages from climate impacts like heat waves. Expanding renewables and storage will increase community resilience during Power Safety Shut-off events and allow homes to maintain service during those times. The installation and maintenance of new solar technology will also support local green jobs.

Community Resilience and Wellbeing

Prepare for climate and non-climate emergencies and integrate climate considerations across City and community decision-making.

Strategy CRW-1 Improve community resilience and reduce vulnerability to climate change. In Pleasanton, we have experienced poor air quality due to wildfires, mandatory water usage cuts due to droughts, and increased temperatures. Access to programming that supports, educates, and improves the quality of life for the most vulnerable communities is essential to improve resilience and prepare communities for climate impacts. Existing programs encourage active lifestyles and green space, which enhance public health. To continue to support healthy communities, the City of Pleasanton will maintain current community resilience programs and dedicate resources to comprehensive climate awareness, education, and outreach, both of which are critical to understanding how to prepare for climate change and the consequences of inaction.

Natural Systems

Offset GHG emissions by fostering resilient natural landscapes that improve habitats, ecosystems, and public health.

Strategy NS-1 Increase and optimize carbon sequestration, improve ecosystem resilience. The GHG emissions reductions needed to achieve per capita carbon neutrality by 2045 are significant. Even with significant emissions reductions, carbon sequestration (i.e., storing carbon in soil, trees, and vegetation) is a critical piece of meeting the City's targets. Carbon sequestration can offset emissions that may persist and be challenging to remove (e.g., natural gas from industries that do not currently have alternative fuel options). The City maintains a significant amount of open and green spaces, including parks, medians, the golf course, and hillsides so this strategy represents a significant opportunity for Pleasanton to offset emissions. Successful sequestration and ongoing sustainable land management will also restore and improve ecosystem resilience, alleviating the pressure and stress on Pleasanton's natural systems from global climate change and localized extreme heat, water shortages, pesticide use, and land development.

Water Resources

Reduce GHG emissions from water usage (including conveyance) and prepare community water resources for a changing climate which will result in cost savings, enhance water quality and availability, improve infrastructure, and increase resiliency.

Strategy WR-1 Improve water supply and increase conservation. Water is the foundation of life, and Pleasanton has already experienced mandated water cuts due to drought conditions. The City will continue to prioritize a sustainable, healthy water supply and storage, building on the success of existing programs such as the Controller Assistant Program and Water Conservation Program. Continued success in water efficiency and conservation also ensures enough water for natural systems, increasing both ecosystem and community resilience.

Strategy WR-2 Improve stormwater resilience. To maximize water reuse and efficiency, the City will increase stormwater infrastructure resilience to prepare for changes to flow and quality. By capturing stormwater, the City can both help to reduce flooding impacts of heavy rainfall periods and improve local water supplies. These benefits support community health, reduce water bills, may increase water availability for ecosystems, and may bring more green jobs to Pleasanton.

Materials and Consumption

Reduce GHG emissions from materials management and consumption which will support regional waste reduction efforts.

Strategy MC-1 Increase waste diversion and optimize collection and disposal systems. Waste collection and processing release a significant amount of methane gas, a greenhouse gas with a global warming potential 84 times greater than carbon dioxide. Diverting waste from the landfill and optimizing collection and disposal not only reduces processing emissions, it increases the supply of recycled and composted content available for a variety of uses and helps improve local air and soil quality.

Strategy MC-2 Enhance sustainable production and reduce consumption. Recognizing the significant GHG emissions from consumption must ultimately be reduced through consumer behavior change, efforts to reduce barriers to and incentivize sustainable consumption are essential to meaningful reductions in consumption-based emissions. Sustainable consumption can increase waste diversion, which supports local air and soil quality improvements. It also supports the local economy and can strengthen social ties and financial resilience as communities rely more on local businesses.

Vineyard Avenue Corridor Specific Plan

Site 27 (PUSD-Vineyard) is within the Vineyard Avenue Corridor Specific Plan, which was adopted in 1999. The Vineyard Avenue Corridor Specific Plan is intended to serve as the primary land use and infrastructure regulatory guide for development of the 384-acre Vineyard Avenue Corridor area

located along Vineyard Avenue in southeast Pleasanton.³² The Vineyard Avenue Corridor Specific Plan includes the following measures to improve construction energy efficiency:

Energy Efficient Construction

- a) Energy efficient heating and cooling systems and energy efficient lighting shall be required in all residential, commercial, and school construction.
- b) Only United States Environmental Protection Agency-approved fireplaces and wood-burning stoves shall be permitted in residential uses.³³

Hacienda Planned Unit Development Plan Design Guidelines

The Hacienda Planned Unit Development (PUD) Plan Design Guidelines do not contain regulations relevant to Energy.

Pleasanton Municipal Code

The Pleasanton Municipal Code (Municipal Code) include the following measures to reduce air quality, noise, and waste impacts, that also reduces energy consumption.

9.04.100 Construction

Notwithstanding any other provision of this chapter, between the hours of 8:00 a.m. and 8:00 p.m. daily, except Sunday and holidays, when the exemption shall apply between 10:00 a.m. and 6:00 p.m., construction, alteration or repair activities which are authorized by a valid city permit shall be allowed.

9.20.080 Solid waste, recyclables and organic waste—Disposal and recycling

- A. Unless otherwise provided in a collection contract entered into pursuant to Section 9.20.100 of this chapter, the solid waste, recyclables and organic waste collector shall dispose of, or recycle, as applicable, all solid waste, recyclables and organic waste outside of the city limits by fill and cover method in a place and manner that shall not be a nuisance to the inhabitants nearby, or reasonably objectionable to the City Council. The place and manner of such disposal or recycling must also have the approval of the County health officer, the State Board of Health, and other regulatory agency, as applicable.
- B. Organic waste may be fed to chickens and other animals on the premises where organic waste is produced, provided that said premises are always kept in a sanitary condition to the satisfaction of the City, and provided further, that the keeping and feeding of such chickens and animals shall at all times conform to the ordinances and regulations governing the same now in force in the City or which may hereafter be enacted.
- C. Food recovery, meaning actions to collect and distribute food for human consumption that otherwise would be disposed, or as otherwise defined in Title

³² City of Pleasanton. 1999. Vineyard Avenue Corridor Specific Plan. June 1.

³³ No fireplaces nor wood-burning stoves are permitted to be installed, pursuant to BAAQMD Regulation 6, Rule 3.

14 California Code of Regulation Section 18982(a)(24), is allowed in compliance with State, County and local laws and regulations.

- D. All solid waste, recyclables and organic waste once collected shall become the property of the collector with a collection contract entered into pursuant to Section 9.20.100 of this chapter unless otherwise specifically stated in a written agreement between such collector and the City. (Ordinance 2226 § 3, 2021; Prior Code § 4-4.11).

9.21.030 Waste management plan

- A. WMP Application. Each applicant of a regulated project shall submit an electronic WMP application through the City's designated online waste management and tracking system prior to beginning any project that requires a building, demolition, or similar construction permit. The completed WMP application shall include all of the following:
 - 1. The address or location, building permit number(s) and description of the project.
 - 2. Project information, such as the job valuation, area of work, permit number, tract information (if known), project diversion rate and relevant personnel involved with this WMP.
 - 3. The estimated quantities of all materials to be salvaged, recycled and/or disposed.
 - 4. The hauling and disposal method.
 - 5. The facility or facilities being utilized for salvage, recycling or disposal of construction or demolition materials.
 - 6. The applicant shall certify their acknowledgment of, and agreement to comply with both the City's franchise collector requirements and hauling and self-hauling regulations. (Ordinance 2120 § 1, 2015; Ordinance 1992 § 1, 2009).

17.50 Green Building

As provided in Municipal Code 17.50.010, the purpose of this chapter is to enhance public welfare and assure that further residential, commercial, and civic development is consistent with the city's desire to create a more sustainable community by incorporating green building into the design, construction, and maintenance of buildings. The green building practices referenced in this chapter are design to achieve the following goals:

- A. To encourage resource conservation;
- B. To reduce the waste generated by construction projects;
- C. To increase energy efficiency; and
- D. To promote the health and productivity of residents, workers, and visitors to the city. (Ordinance 934 § 1 2006).

20.26.010 California Green Building Standards (CALGreen) Code adopted

There is adopted by reference that certain code known as the California Green Building Standards (CALGreen) Code at Title 24 California Code of Regulations Part 11 (2019 Edition), as more particularly described in this section, except such provisions that are amended, modified or deleted in this chapter, and the same is adopted and incorporated as fully as if set out in this chapter. A copy of said code is available for use by the public at the City of Pleasanton’s Building Division.

20.26.070 Section 5.408 amended—Construction waste reduction, disposal and recycling

5.408.1 Construction waste management. As provided in Municipal Code Chapter 9.21, “regulated projects” as defined therein shall comply with Municipal Code Chapter 9.21. All other projects that are not regulated by Municipal Code Chapter 9.21 subject to CALGreen requirements shall comply with CALGreen Section 4.408, as applicable.

5.408.3 Excavated soil and land clearing debris. 100 percent of trees, stumps, rocks, and associated vegetation and soils resulting primarily from land clearing shall be reused or recycled. For a phased project, such material may be stockpiled on-site until the storage site is developed.

Chapter 20.70 Expedited Permitting Process for Clean Energy Systems

20.70.010 Purpose. The purpose of this chapter is to provide an expedited solar permitting process that complies with the Solar Rights Act and AB 2188 (Chapter 521, Statutes 2014, California Government Code Section 65850.5), and AB 1236 for electric vehicle charging stations (Chapter 598, Statutes 2015, California Government Code Section 65850.7) and electric vehicle charging stations in order to achieve timely and cost-effective installations of small residential rooftop solar energy systems by removing unreasonable barriers and minimizing costs to property owners. This chapter allows the City to achieve these goals while protecting the public health and safety. (Ordinance 2166 § 2, 2017; Ordinance 2126 § 1, 2015)

3.5.4 - Project Impacts and Mitigation Measures

Significance Criteria

The City is utilizing Appendix G to the State CEQA Guidelines as thresholds of significance for this Housing Element Update. To determine whether impacts related to energy are significant environmental effects, the following questions are analyzed and evaluated. Would the Housing Element Update:

- a) Result in potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation?
- b) Conflict with or obstruct a State or local plan for renewable energy or energy efficiency?

Approach to Analysis

This analysis is based on operational energy demand that would result from projected future growth at buildout of the Housing Element Update. To determine the increase in energy demand, the net residential land uses that could be developed with implementation of the Housing Element Update is estimated by calculating the buildout of Housing Element Update, assumed at 2031 to provide a conservative analysis. The 2020 existing conditions represents the environmental baseline from which impacts associated with implementation of the Housing Element Update are assessed. The year 2020 is used as the environmental baseline because it is the latest available data.

The California Emissions Estimator Model (CalEEMod) Version 2020.4.0 was used to compute energy demand associated with buildout of the proposed project (see Appendix C).

Impact ENER-1: Wasteful, Inefficient, or Unnecessary Energy Consumption

The methodology employed under Impact ENER-1, which focuses on determining whether the development consistent with the Housing Element Update would result in the wasteful, inefficient, or unnecessary consumption of energy resources, follows the guidance provided in Appendix F of the State CEQA Guidelines as well as the analytical precedent set by *League to Save Lake Tahoe Mountain etc. v. County of Placer* (2022) 75 Cal.App.5th 63, 164-168).

According to Appendix F of the State CEQA Guidelines, the goal of conserving energy is translated to include decreasing overall per capita energy consumption; decreasing reliance on fossil fuels such as coal, natural gas, and oil; and increasing reliance on renewable energy sources. In *County of Placer, supra*. 75 Cal.App.5th at pp. 164-168), the Appellate Court concluded that the analysis of wasteful, inefficient, and unnecessary energy consumption was not adequate because it did not consider whether additional renewable energy features can be added to the project.

The Housing Element Update would be considered to result in a potentially significant impact if it would result in wasteful, inefficient, or unnecessary consumption of energy resources. Considering the guidance provided by Appendix F of the State CEQA Guidelines and the Appellate Court decision in *County of Placer, supra*. 75 Cal.App.5th at pp. 164-168, the Housing Element Update would be considered to result in wasteful, inefficient, or unnecessary consumption of energy resources if it would conflict with the following Appendix F energy conservation goals:

- Decreasing overall per capita energy consumption;
- Decreasing reliance on fossil fuels such as coal, natural gas, or oil; and
- Increasing reliance on renewable energy sources.

Impact ENER-2: Renewable Energy and Energy Efficiency Plan Consistency

Similar to the impact discussion under Impact GHG-2 contained in Section 3.7, Greenhouse Gas Emissions, this impact discussion focuses on project consistency with a local plan or policy adopted for the purpose of improving energy efficiency or reliance on renewable energy sources. The impact discussion under Impact GHG-2 differs from this impact discussion in that Impact GHG-2 explores project consistency with relevant policies intended to reduce GHG emissions, which often encompass energy efficiency and renewable energy measures. Impact ENER-2, by contrast, focuses

on project consistency with relevant policies intended to improve energy efficiency and encourage the use of renewable energy sources. Therefore, while both Impact GHG-2 and Impact ENER-2 discuss project consistency with the General Plan and CAP 2.0, Impact ENER-2 focuses solely on policies applicable to energy consumption. As such, the Housing Element Update would be determined to conflict with the applicable energy efficiency or renewable energy plan if it would not adhere to applicable energy consumption related measures included in the General Plan and CAP 2.0.

Impact Evaluation

Energy Use

Impact ENER-1: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not result in potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation.

Implementation of the Housing Element Update would utilize energy resources during construction and operational activities. Energy resources that would be potentially impacted include electricity, natural gas, and petroleum-based fuel supplies and distribution systems.

Construction Energy Usage

The Housing Element Update does not expressly authorize construction of any development. Construction activities associated with individual development projects consistent with the Housing Element Update would consume energy in the form of petroleum fuel for heavy equipment, as well as from worker trips and material delivery trips to construction sites. Temporary electrical grid power may also be provided to construction sites. It is too speculative at this time to calculate energy usage associated with construction activities because the details regarding future construction activities are not known, including phasing, construction duration, and construction equipment. It should be noted that subsequent environmental review of future development projects would be required to assess potential construction-related energy consumption impacts.

During construction, new development would be subject to energy conservation requirements in the California Energy Code (Title 24, Part 6, of the California Code of Regulations, California's Energy Efficiency Standards for Residential and Nonresidential Buildings), CALGreen (Title 24, Part 11 of the California Code of Regulations), and Municipal Code Chapter 17.50 Green Building. The Municipal Code also contains rules and regulations to reduce energy usage during construction. Chapter 9.21 Waste Management Plan and Section 20.26.070's Section 5.408 promote the redirection of recyclable materials generated during construction away from landfills. All project sponsors would be required to complete and submit a recycling management plan to estimate the volume of debris to be generated during construction and the estimated amount of debris that would be sent to the landfill.

The intent of Chapter 9.21 is to divert as much as debris waste from most construction, demolition, and renovation projects away from local landfills. Development consistent with the Housing Element Update would be required to comply with standards for new construction established by the State and Bay Area Air Quality Management District (BAAQMD). Development consistent with the Housing

Element Update would also adhere to the development standards in the Municipal Code and other applicable federal, State, and local laws. With adherence to applicable regulations, the development consistent with the Housing Element Update would not result in wasteful, inefficient, or unnecessary consumption of energy during construction.

Operation Energy Usage

Implementation of the Housing Element Update may result in development of up to 7,787 new residential units within the city. Operation of the potential new development in the city would consume natural gas and electricity for building heating and power, lighting, and water conveyance, among other operational requirements. The electrical consumption and natural gas usage associated with the potential development have been calculated in the CalEEMod model. Energy consumption is summarized in Table 3.5-1.

Table 3.5-1: Annual Project Energy Consumption

Energy Consumption Activity	Annual Consumption
Electricity Consumption	35,079,950 kWh/year
Natural Gas Consumption	95,219,790 kBTU/year
Vehicle Fuel Consumption	5,831,526 gallons/year
Notes: kBTU = kilo-British Thermal Unit kWh = kilowatt-hour Source: Appendix C	

Operation of development consistent with the Housing Element Update is estimated to consume approximately 35,079,950 kWh of electricity, 95,219,790 kBTU of natural gas, and 5,831,526 gallons of transportation fuel annually. As previously discussed, the Housing Element Update would be considered to result in a potentially significant impact if it would result in wasteful, inefficient, or unnecessary consumption of energy resources. Considering the guidance provided by Appendix F of the State CEQA Guidelines and the Appellate Court decision in *County of Placer, supra*. 75 Cal.App.5th pgs. 164-168, the proposed project would be considered to result in wasteful, inefficient, or unnecessary consumption of energy resources if it would conflict with the following energy conservation goals:

- Decreasing overall per capita energy consumption;
- Decreasing reliance on fossil fuels such as coal, natural gas, or oil; and
- Increasing reliance on renewable energy sources.

These criteria are discussed in detail below.

Decreasing Overall Per Capita Energy Consumption

As discussed in Section 3.2, Air Quality, implementation of the Housing Element Update would result in population growth which outpaces the forecasted VMT growth. As such, the Housing Element Update would result in an overall decrease in per capita transportation energy consumption with

respect to transportation energy resources. As such, energy consumption related to per capita transportation would decrease from that experienced by the region's current per capita transportation energy consumption patterns.

As discussed above in Section 3.5.2, Existing Setting, the County currently has estimated per capita energy consumption of 6,162 kWh of electricity and 13 MMBtu of natural gas per year. Because energy consumption data is not available at the city level, the County estimates are utilized herein. As shown in Table 3.5-1, development consistent with the Housing Element Update is anticipated to utilize 35,079,950 kWh per year and up to 95,220 MMBtu per year. This number does not include any mitigation or consideration of future implementation of CAP 2.0 measures. As the Housing Element Update could result in a maximum of 18,029 residents, the per capita energy consumption is estimated at 1,946 kWh per year and 5.28 MMBtu per year, both of which would be below the County's average electricity and natural gas consumption rates.

It should be noted that development consistent with the Housing Element Update is likely to consume less electricity than what is disclosed in this analysis because the energy consumption estimates rely on CalEEMod Version 2020.4.0, which assumes minimum energy efficiency design compliant with the 2019 California Building Code. Because development is anticipated to be permitted after January 1, 2023, individual development projects would be subject to additional energy efficiency standards beyond what is currently required at the time of this analysis. Considering the above assessment, development consistent with the Housing Element Update is considered consistent with this criterion with respect to decreasing per capita energy consumption.

Decreasing Reliance on Fossil Fuels

The Housing Element Update would be considered to conflict with this criterion if it did not take steps to decrease the reliance on fossil fuels. As discussed above, implementation of the Housing Element Update would result in population growth which outpaces the forecasted VMT growth, which would result in a relative decrease from the County per capita consumption rates for natural gas and electricity. While a decrease in per capita electricity consumption may not directly translate to a decreasing reliance on fossil fuels—due to the incremental increase of renewable and carbon-free generation sources for in-state electricity sales through 2045 as required under SB 100—a decrease in per capita natural gas and transportation fuels translate directly to a decrease in reliance on fossil fuel energy resources.

Moreover, various strategies contained in the CAP 2.0 would further reduce energy consumption and reliance on fossil fuel energy resources. For instance, implementation of Strategy BE-1 would result in the default electricity service choice being a zero-emission service option for both community and municipal operations. Strategy BE-1 would also result in the implementation of an all-electric reach code for new construction, which would preclude the future installation and consumption of natural gas plumbing for building energy needs and space and water heating needs. Strategy BE-2 would further promote energy efficiency upgrades and retrofits in buildings into the future, and Strategy BE-3 would expand the use of renewable energy generation and storage. Other strategies of the CAP 2.0, such as Strategy TLU-1, would also serve to reduce fossil fuel reliance for transportation through the improved use of EVs and installation of EV charging infrastructure. Therefore, through

compliance with federal, State, and local regulations, development consistent with the Housing Element Update would be consistent with this criterion.

Increasing Reliance on Renewable Energy Sources

New construction would be designed and constructed consistent with the State's Title 24 Building Energy Efficiency Standards, which are widely regarded as some of the most advanced building energy efficiency standards in the country. Consistent with the State's Title 24 requirements, new residential construction would be required to incorporate a series of renewable energy design and energy efficiency features. The most notable of these includes the requirement for installing rooftop solar meeting a minimum system output according to Part 6, Subchapter 8, of Title 24. This Title 24 standard would require new all new low-rise residential buildings to include rooftop solar systems or seek a specific exception to the code. Exceptions include not having sufficient roof space to support a solar panel array or choosing to instead contribute to a community solar or battery storage facility, among others. As the exceptions accommodate specific circumstances when including rooftop solar may not be technologically feasible or where similar technologies are being employed elsewhere, it is anticipated that a majority of the future residential development facilitated by the Housing Element Update would comply with the requirements of Title 24, Part 6, Subchapter 8 without seeking an exception.

Moreover, the CAP 2.0 contains several measures which would further increase reliance on renewable energy resources. For instance, Strategy BE-1 would promote the use of zero-emission electricity. Strategy BE-1 would also result in the implementation of an all-electric reach code for new construction, which would preclude the future installation and consumption of natural gas plumbing for building energy needs and space and water heating needs. Strategy BE-2 would further promote energy efficiency upgrades and retrofits in buildings into the future, and Strategy BE-3 would expand the use of renewable energy generation and storage. Other strategies included in the CAP 2.0, such as Strategy TLU-1, would also serve to increase reliance on renewable energy resources through the improved use of EVs and installation of EV charging infrastructure. These local strategies combined with Statewide strategies, such as SB 100, which requires the incremental increase of renewable and carbon-free generation sources for in-State electricity sales through 2045, would continue to increase reliance on renewable energy resources. Furthermore, the goals and policies of the Housing Element Update, including Goal 6 and Policies 6.2, 6.3, and 6.5 would support increased reliance on renewable energy resources. Therefore, development consistent with the Housing Element Update would be consistent with this criterion.

As discussed above, energy consumption associated with development consistent with the Housing Element Update would not be wasteful, inefficient, or unnecessary, consistent with the energy considerations contained in State CEQA Guidelines Appendix F. This impact would be less than significant.

Level of Significance

Less than significant impact.

Energy Efficiency and Renewable Energy Standards Consistency

Impact ENER-2: Development consistent with the Housing Element Update, rezonings, and General and Specific Plan Amendments would not conflict with or obstruct a State or local plan for renewable energy or energy efficiency.

Development envisioned by the Housing Element Update could result in an increase in new residential land uses. It should be noted that the Housing Element Update does not expressly authorize construction of any development. New residential development facilitated by the Housing Element Update would be required to comply with the General Plan policies and programs and adherence to the development standards within Title 9 and Title 20 in the Municipal Code as well as other applicable State and local regulations.

The City adopted its CAP 2.0 in 2022, which addresses potential impacts related to climate change through the implementation of the energy efficiency measures that are listed in Section 3.5.3, Regulatory Setting. All development consistent with the Housing Element Update would be required to implement all applicable energy efficiency measures required by the General Plan. In addition, development consistent with the Housing Element Update would be required to adhere to the Municipal Code, which contains rules and regulations regarding energy efficiency. Chapter 20.26 adopts the 2019 California Energy Code, Title 24, Part 6, and incorporates the code into the Municipal Code. Code 20.26.070's Section 5.408 promotes the redirection of recyclable materials generated during construction away from landfills. Code Section 9.20.080 supports recycling the solid waste, recyclables, and organic waste.

In addition, development consistent with the Housing Element Update would have to comply with applicable State or regional plans for renewable energy or energy efficiency that include Plan Bay Area 2050, BAAQMD 2017 Clean Air Plan, 2007 State Alternative Fuels Plan, Executive Order N-79-20, requiring, 100 percent of new passenger vehicles sold in California to be zero-emissions by 2035, 2008 Energy Action Plan Update, 2011 Energy Efficiency Strategic Plan, and SB 100 that requires 100 percent of retail sales of electricity to be generated from zero-carbon emission sources by the end of 2045. Moreover, the development consistent with the Housing Element Update would support the CAP 2.0 strategies for renewable energy and energy efficiency by implementing various General Plan policies that would apply to future development facilitated by the Housing Element Update. For instance, Goal 1 of the General Plan's Energy Element promotes the use of sustainable and renewable energy, Policy 2 would encourage the reduced consumption of electricity and natural gas resources, and Policy 7 would promote the use of renewable energy.

Development consistent with the Housing Element Update would be required to comply with applicable General Plan goals, policies, and programs, CAP 2.0, and development standards in the Municipal Code, which would ensure that development consistent with the Housing Element Update would not conflict with or obstruct State or local plans for renewable energy or energy efficiency. Therefore, this impact would be less than significant.

Level of Significance

Less than significant impact.

3.5.5 - Cumulative Impacts

The geographic scope for cumulative impacts with respect to energy would be the City of Pleasanton. As the city is largely developed with a mix of uses, cumulative development occurring within the city would not result in cumulative impacts to the physical capacity, service levels, or funding available as service provider projections take citywide growth into consideration. Furthermore, each cumulative project would be required to adhere to all applicable federal, State, and local goals, policies, and actions, including those of the General Plan and Title 24 standards that would ensure cumulative projects do not exceed current capacity or conflict with or obstruct a State or local plan for renewable energy or energy efficiency. For these reasons, cumulative impacts related to energy usage would be less than significant.

As discussed above, development consistent with the Housing Element Update would generate energy demand during construction and operation, principally consisting of electricity, natural gas, and transportation fuel consumption. Construction energy demand generated during construction of future projects facilitated by the Housing Element Update would largely be limited to the activities which would be required for the construction of mostly residential units, which, because they would be completed in compliance with applicable federal, State, and local regulations and out of the interest of minimizing development costs, would not constitute the unnecessary, inefficient, or wasteful consumption of energy resources. Moreover, development would be designed to Title 24 energy efficiency standards and future individual development proposals would be required to comply with applicable General Plan policies and programs, standards included in the Municipal Code, and CAP 2.0 policies aimed at improving energy efficiency and renewable energy use. Therefore, development consistent with the Housing Element Update would not result in the unnecessary, inefficient, or wasteful consumption of energy resources nor would it conflict with applicable plans, policies or regulations adopted for renewable energy and energy efficiency. As such, the Housing Element Update, in conjunction with other planned and approved projects, would result in a less than significant cumulative impact with respect to energy usage and conflicts with applicable plans, policies, and regulations.

Level of Cumulative Significance

Less than significant impact.

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3.6 - Geology and Soils

3.6.1 - Introduction

This section of the Draft Program Environmental Impact Report (Draft Program EIR) addresses potential physical environmental effects related to seismic hazards, underlying soil characteristics, slope stability, erosion, and paleontological resources within the potential sites for rezoning resulting from implementation of the proposed 2023-2031 (6th Cycle) Housing Element Update, rezonings, General Plan and Specific Plan Amendments (collectively referred to herein as the Housing Element Update). Future projects facilitated by the Housing Element Update would be evaluated for project-specific impacts related to geology and soils at the time they are proposed. The descriptions and analysis in this section are based, in part, on statements, data, and figures provided by the following reference materials: City of Pleasanton General Plan (General Plan), Pleasanton Municipal Code (Municipal Code), United States Department of Agricultural (USDA) Natural Resource Conservation Service (NRCS) Web Soil Survey, United States Geological Survey (USGS) Interactive Fault Map, California Geological Survey (CGS) Earthquake Zones of Required Investigation, Dublin and Livermore Quadrangle, and the California Department of Conservation CGS Seismic Hazard Zone Report for the geologic map. Once the Housing Element Update is adopted, the General Plan would be amended to include the Housing Element Update. Therefore, all references to the General Plan include the Housing Element Update.

3.6.2 - Environmental Setting

Geologic Setting

Alameda County

Alameda County (County) is situated in the San Andreas and Hayward Fault zones—one of the most seismically active regions in the United States—and is part of the Coast Ranges geomorphic province. The Coast Range Geomorphic Province includes the northwest trending belt of mountain ranges, valleys, and basins that parallel the California coastline. Principal physical geographic features include the Bay Plain and Diablo Range.

City of Pleasanton

The City of Pleasanton (City) is within the Coast Range Geomorphic Province,¹ which extends from Santa Barbara County to Del Norte County. The Coast Ranges are dominated by a series of northwest trending ranges that have been folded and faulted in a tectonic regime with intervening alluvial valleys. The bedrock of the Coast Ranges is chiefly made up of volcanic rocks and ancient seafloor sediments. In many areas, these volcanic rocks have been significantly hardened, mineralized, folded, and fractured by heat and pressure deep within the earth. This bedrock is generally separated into the Great Valley Sequence and the Franciscan Complex and comprises several of the hills and mountains throughout the San Francisco Bay Area (Bay Area). The city and all potential sites

¹ A geomorphic province possesses similar age, history, structure, and bedrock; California has 11 geomorphic provinces.

for rezoning are located within Amador-Livermore Valley, which is part of a broad, flat-lying basin underlain with Quaternary age alluvium² deposited by the regions' streams and rivers.³

Regional Faulting and Seismic Hazards

Earthquake Terminology and Concepts

Seismicity

The term seismicity refers to the location, frequency, magnitude, and other characteristics of earthquakes. To understand the implications of seismic events, a discussion of faulting and seismic hazards is provided below.

Faulting

Faults form in rocks when stresses overcome the internal strength of the rock, resulting in a fracture. Large faults develop in response to large regional stresses operating over a long time, such as those stresses caused by the relative displacement between tectonic plates. According to the elastic rebound theory, these stresses build up in the earth's crust until enough stress has built up to exceed the strength along a fault and cause a brittle failure. The rapid slip between the two stuck plates or coherent blocks generates an earthquake. Following an earthquake, stress will build once again until the occurrence of another earthquake. The magnitude of slip is related to the maximum allowable stress that can be built up along a particular fault segment. The greatest buildup in stress due to the largest relative motion between tectonic plates or fault blocks over the longest period will generally produce the largest earthquakes. The distribution of these earthquakes is important for both hazard prediction and the study of active deformation of the earth's crust. Deformation is a complex process, and strain caused by tectonic forces is not only accommodated through faulting, but also by folding, uplift, and subsidence, which can be gradual or in direct response to earthquakes.

Faults are mapped to determine earthquake hazards, since they occur where earthquakes tend to reoccur. A historic plane of weakness is more likely to fail under stress than a previously unbroken block of crust. Faults are, therefore, a prime indicator of past seismic activity, and faults with recent activity are presumed to be the best candidates for future earthquakes. However, since slip is not always accommodated by faults that intersect the surface along traces, and since the orientation of stress and strain in the crust can shift, predicting the location of future earthquakes is complicated. Earthquakes sometimes occur in areas with previously undetected faults or along faults previously thought inactive.

The State of California defines an active fault as one that has experienced surface displacement within Holocene time (within the last 11,000 years). With respect to fault rupture zones, the California Geologic Survey defines a potentially active fault as one that has shown evidence of surface displacement during the Quaternary age (within the last 1.6 million years). Only faults with a relatively high potential for ground rupture are mapped, and only "sufficiently active"⁴ and "well-

² Quaternary Alluvium is a broad term referring to geologically recent (i.e., within the last 1.8 million years) deposits of gravel, sand, silt, and clay that are basin or valley-forming.

³ California Department of Conservation. 2015. Geologic Map of California. Website: <https://maps.conservation.ca.gov/cgs/gmc/>. Accessed March 21, 2022.

⁴ A fault is identified as sufficiently active if there is evidence of Holocene surface displacement along one or more of its segments or

defined”⁵ faults are zoned. “Blind” faults do not provide evidence of past seismic activity, even if they occurred in the recent past; faults confined to pre-Quaternary rocks (over 1.6 million years old) are considered inactive and incapable of (or unlikely to) generate an earthquake.

Earthquake Magnitude

The severity of ground shaking depends on several variables such as earthquake magnitude, epicenter distance, local geology, thickness, and seismic wave-propagation properties of unconsolidated materials, groundwater conditions, and topographic setting. Ground shaking hazards are most pronounced in areas near faults or with unconsolidated alluvium.

The most common type of damage from ground shaking is structural damage to buildings, which can range from cosmetic cracks to total collapse. The overall level of structural damage from a nearby large earthquake would likely be moderate to heavy, depending on the characteristics of the earthquake, the type of ground, and the condition of the building. Besides damage to buildings, strong ground shaking can cause severe damage from falling objects or broken utility lines. Fire and explosions are also hazards associated with strong ground shaking.

The moment magnitude accounts for the actual energy released by an earthquake. Actual damage is due to the propagation of seismic or ground waves because of an earthquake, and the intensity of shaking is related to earthquake magnitude and distance and the condition of underlying materials. Loose and soft materials tend to amplify long period vibrations, while hard rock can quickly attenuate them, causing little damage to overlying structures. For this reason, the Modified Mercalli Intensity (MMI) Scale, described in more detail below, provides a useful qualitative assessment of ground shaking. The MMI Scale is a 12-point scale of earthquake intensity based on local effects experienced by people, structures, and earth materials. Each succeeding step on the scale describes a progressively greater amount of damage at a given point of observation. In addition, earthquake magnitude is a measure of overall earthquake size at the epicenter, and is recorded by the Richter Scale, a logarithmic scale related to seismograph readings.

The Uniform California Earthquake Rupture Forecast (UCERF) evaluated the 30-year probability of an MMI 6.7 or greater earthquake occurring on the known active fault systems in the Bay Area, including the Calaveras Fault. The UCERF generated an overall probability of 63 percent for the Bay Area as a whole, a probability of 31 percent for the Hayward Fault, 7 percent for the Calaveras Fault, and 3 percent for the Concord–Green Valley fault.⁶ According to the General Plan, portions of the city that are underlain by loosely compacted soil may experience the greatest amount of ground shaking and damage.

branches. Holocene surface displacement can be directly observable or inferred; it does not need to be present everywhere along a fault to qualify for zoning.

⁵ A fault is deemed well-defined if it has a trace that is clearly detectable by a trained geologist as a physical feature or is just below the ground surface. The fault may be evaluated by indirect (e.g., geomorphic evidence) or direct methods. The most important consideration is that the fault, or part of it, can be located in the field with enough precision and confidence that it can be determined that the required site-specific investigation would be successful.

⁶ United States Department of the Interior and United States Geologic Survey. 2015. Fact Sheet 2015-3009. March. Website: <https://pubs.usgs.gov/fs/2015/3009/pdf/fs2015-3009.pdf>. Accessed March 21, 2022.

Peak Ground Acceleration

One accepted measure of ground motion during an earthquake is the peak ground acceleration (PGA). PGA equals the maximum ground acceleration that occurred during earthquake shaking at a location; it also equals the amplitude of the largest absolute acceleration recorded on an accelerogram⁷ at a site during an earthquake. As opposed to measures of magnitude that provide a single measure of earthquake energy, PGA is useful because it varies from location to location and is dependent on the distance from the epicenter of an earthquake and the character of the underlying geology (e.g., soft sediments, artificial fills, or hard bedrock).

The Modified Mercalli Intensity Scale

The MMI Scale, included as Table 3.6-1, provides an intensity value based on the observed effects of ground shaking produced by an earthquake. Unlike PGA, the MMI Scale is determined through qualitative effects (i.e., observed effects rather than measured values). However, similar to PGA, MMI intensity values are variable depending on an earthquake’s magnitude, the distance from its epicenter, the focus of its energy, and the type of geologic material. Since the MMI Scale measures ground shaking effects, intensity values correspond to a range of PGA values, also provided in Table 3.6-1.

Table 3.6-1: Earthquake Magnitude and Intensity

Intensity Value	Richter Magnitude	Perceived Shaking	Intensity Description	Average Peak Ground Acceleration ¹
I	2	Not felt	Not felt except by a very few persons under especially favorable circumstances.	< 0.0017 g
II	2	Weak	Felt only by a few persons at rest, especially on upper floors on buildings; delicately suspended objects may swing.	0.0017-0.014 g
III	3	Weak	Felt noticeably indoors, especially on upper floors of buildings, but many people do not recognize it as an earthquake; standing motor cars may rock slightly, vibration similar to a passing truck; duration estimated.	0.0017-0.014 g
IV	4	Light	During the day felt indoors by many, outdoors by few; at night, some awakened; dishes, windows, doors disturbed; walls make cracking sound; sensation like heavy truck striking building. Standing motor cars rocked noticeably.	0.014–0.039 g
V	4	Moderate	Felt by nearly everyone, many awakened; some dishes and windows broken; a few instances of cracked plaster; unstable objects overturned; disturbances of trees, poles may be noticed; pendulum clocks may stop.	0.035–0.092 g
VI	5	Strong	Felt by all, many are frightened and run outdoors; some heavy furniture moved; fallen plaster or damaged chimneys; slight damage.	0.092–0.18 g

⁷ A machine used to record the acceleration of the ground during an earthquake.

Intensity Value	Richter Magnitude	Perceived Shaking	Intensity Description	Average Peak Ground Acceleration ¹
VII	5	Very Strong	Everybody runs outdoors; damage negligible in buildings of good design and construction; slight to moderate in well-built ordinary structures; considerable in poorly built or badly designed structures; some chimneys broken; noticed by persons driving motor cars.	0.18–0.34 g
VIII	6	Severe	Damage slight in specially designed structures; considerable in ordinary substantial buildings, with partial collapse; great in poorly built structures; panel walls thrown out of frame structures; fall of chimneys, factory stacks, columns, monuments, walls; heavy furniture overturned; sand and mud ejected in small amounts; changes in well water; persons driving motor cars disturbed.	0.34–0.65 g
IX	7	Violent	Damage considerable in specially designed structures; well-designed frame structures thrown out of plumb; great in substantial buildings, with partial collapse; buildings shifted off foundations; ground cracked conspicuously; underground pipes broken.	0.65–1.24 g
X	7	Extreme	Some well-built wooden structures destroyed; most masonry and frame structures destroyed with foundations; ground badly cracked; rails bent; landslides considerable from riverbanks and steep slopes; shifted sand and mud; water splashed (slopped) over banks.	> 1.24 g
XI	8	Extreme	Few, if any, (masonry) structures remain standing. Bridges destroyed. Broad fissures in ground. Underground pipelines completely out of service. Earth slumps and land slips in soft ground. Rails bent greatly.	> 1.24 g
XII	8+	Extreme	Damage total. Practically all works of construction are damaged greatly or destroyed. Waves seen on ground surface. Lines of sight and level are distorted. Objects are thrown upward into the air.	> 1.24 g

Notes:

¹ This value is expressed as a fraction of the acceleration due to gravity (g). Gravity (g) is 9.8 meters per second squared. 1.0 g of acceleration is a rate of increase in speed equivalent to a car traveling 328 feet from rest in 4.5 seconds.

Sources:

Association of Bay Area Governments (ABAG). No date. Making Sense of the Modified Mercalli Intensity Scale (MMI)–A Measure of Shaking. Website:

https://abag.ca.gov/sites/default/files/making_sense_of_the_modified_mercalli_intensity_scale.pdf. Accessed March 21, 2022.

City of Pleasanton. 2009. Pleasanton General Plan 2005-2025, Public Safety Element. July 21.

Seismic Context

Hazards occurring near faults include surface rupture and fault creep. A surface rupture happens when movement on a fault deep within the earth breaks through and reaches the ground surface. However, not all earthquakes result in surface rupture. Generally, fault rupture follows a preexisting

fault because they are zones of weakness, and rupture can occur at once during an earthquake or slowly in the form of fault creep. Ruptures that occur suddenly cause more severe damage to structures because they are accompanied by ground shaking. Fault creep is the slow rupture of the earth’s crust, and examples of fault creep have occurred along the Hayward Fault, which crosses highly developed areas within Alameda and Contra Costa counties.

The city lies within a region of California that contains many active and potentially active faults and is considered an area of high seismic activity. In 2007, the USGS, the CGS, and the Southern California Earthquake Center formed the Working Group on California Earthquake Probabilities (Working Group). The purpose of forming this Working Group was to summarize the probability of one or more earthquakes of magnitude 6.7 or higher occurring in California over the next 30 years.⁸ In 2008, accounting for the wide range of possible earthquake sources, the Working Group estimated that the Bay Area has a 63 percent chance of experiencing such an earthquake. In addition, the Working Group concluded that the individual faults posing the greatest threat to the Bay Area are the Hayward, the San Andreas, and the Calaveras (including the related Verona fault) faults, described in more detail below. Other principal active faults capable of producing large earthquakes in the Bay Area include the Concord–Green Valley, Marsh Creek–Greenville, San Gregorio, and Rodgers Creek faults.⁹ Table 3.6-2 provides a list of active faults in the region and a regional fault map depicting these faults is provided in Exhibit 3.6-1.

Table 3.6-2: Active Faults in the Region

Fault	Closest Distance and Direction	Regency of Movement ¹	Future Earthquake Probability ²	Historical Seismicity	Maximum Moment Magnitude Earthquake (Mw) ³
Calaveras (including Verona fault)	Intersects city limits	Historic	7 percent	M 5.6- M 6.4 in 1861 M 6.2, 1911 in 1984	6.8
Mt. Diablo Thrust	4 miles north	Quaternary (possibly Holocene)	3 percent	Not applicable	6.7
Hayward	3 miles west	Historic	31 percent (combined with Rodgers Creek Fault)	M 6.8 in 1868 Many < M 4.5	7.1
Marsh Creek–Greenville	7 miles east	Historic	3 percent	M 5.6 in 1980	6.9

⁸ City of Pleasanton. 2011. Draft Supplemental Environmental Impact Report. City of Pleasanton Housing Element and Climate Action Plan General Plan Amendment and Rezoning. September.

⁹ City of Pleasanton. 2011. Draft Supplemental Environmental Impact Report. City of Pleasanton Housing Element and Climate Action Plan General Plan Amendment and Rezoning. September.

Fault	Closest Distance and Direction	Regency of Movement ¹	Future Earthquake Probability ²	Historical Seismicity	Maximum Moment Magnitude Earthquake (Mw) ³
Concord–Green Valley	14 miles north	Historic	3 percent	Historic active creep	6.7
San Andreas	21 miles southwest	Historic	21 percent	M 7.1 in 1989 M 8.25 in 1906 M 7.0 in 1838 Many < M 6	7.9
Rodgers Creek	Approximately 35 miles northwest	Holocene	31 percent (combined with Hayward Fault)	M 6.7 in 1898 M 5.6 and 5.7 in 1969	7.0

Notes:

- ¹ Historic refers to the post-colonial era (after 1775); the Holocene is from 11,000 years ago to present.
- ² Probability of one or more earthquakes of magnitude 6.7 or greater in the next 30 years from the Working Group on California Earthquake Probabilities (Working Group). The Working Group estimates the probability of a “background” earthquake not from one of the seven major faults studied to be 9 percent.
- ³ The Maximum Moment Magnitude Earthquake is derived from the joint CDMG/USS Probabilistic Seismic Hazard Assessment for the State of California.

Sources:

Bryant, W.A. and Hart, E. W. 1990, revised and updated 2007. Fault Rupture Hazard Zones in California: Alquist-Priolo Special Studies Zones Act of 1972 with Index to Earthquake Fault Zones Maps, Interim Revision, California Division of Mines and Geology, Special Publication 42.

Jennings, C. W. and Bryant, W.A., 2010. 2010 Fault Activity Map of California, California Department of Conversation Map No. 6, 1:750,000. Working Group on California Earthquake Probabilities. 2008. The Uniform California Earthquake Rupture Forecast, Version 2 (UCERF 2), U.S. Geological Survey Open-File Report 2007-1437 and California Geological Survey Special Report 203. Website: <http://pubs.usgs.gov/of/2007/1437/>. Accessed April 14, 2022.

Peterson, M.D., Bryant, W.A., Cramer, C.H. 1996, updated in 2003. Probabilistic Seismic Hazard Assessment for the State of California, California Division of Mines and Geology Open-File Report issued jointly with U.S. Geological Survey, CDMG OFR 96-08 and USGS OFR 96-706.

Calaveras Fault

The Calaveras Fault is in the eastern San Francisco Bay region and generally trends from north to south along the eastern side of the Oakland Hills into the western Diablo Range, eventually joining the San Andreas Fault Zone south of Hollister. It runs through the city in a north/south direction, almost parallel to Interstate-680 (Exhibit 3.6-1 and Exhibit 3.6-2) and is a major right-lateral strike-slip fault that has been active during the last 11,000 years.¹⁰

The Calaveras Fault has been the source of several moderate magnitude earthquakes, and the probability of a large earthquake (greater than M 6.7) is much lower than on the San Andreas or

¹⁰ City of Pleasanton. 2011. Draft Supplemental Environmental Impact Report. City of Pleasanton Housing Element and Climate Action Plan General Plan Amendment and Rezoning. September.

Hayward faults. In 2008, the Working Group identified the Calaveras Fault as having a 7 percent chance of generating one or more earthquakes of magnitude 6.7 or greater by approximately 2037. The Verona fault, considered related to the Calaveras Fault, is northwest trending and enters the southern boundary of the city limits.¹¹

Hayward Fault

The Hayward Fault Zone is located as close as three miles west of the city. It extends for approximately 60 miles from San Pablo Bay in Richmond, south to the San Jose area. The Hayward Fault has historically generated one sizable earthquake, in 1868, when a Richter magnitude (M) 7 earthquake on its southern segment ruptured the ground for a distance of about 30 miles. Lateral ground surface displacement during this event was at least 3 feet.

A characteristic feature of the Hayward Fault is its well-expressed and relatively consistent fault creep. Although large earthquakes on the Hayward Fault have been rare since 1868, slow fault creep has continued to occur and has caused measurable offset. Fault creep on the East Bay segment of the Hayward Fault is estimated at 9 millimeters per year (mm/year). However, a large earthquake could occur on the Hayward Fault with an estimated MMI of about Maximum Moment Magnitude (Mw) 7.1. In 2008, the Working Group identified the Hayward–Rodgers Creek Fault Systems as having a 31 percent chance of generating one or more earthquakes of magnitude 6.7 or greater by approximately 2037.¹²

San Andreas Fault

The San Andreas Fault Zone is located as close as 21 miles southwest of the city. It is a major structural feature that forms at the boundary between the North American and Pacific tectonic plates. It is a strike-slip fault, extending from the Salton Sea in Southern California near the border with Mexico to north of Point Arena, where the fault trace continues out into the Pacific Ocean. The main trace of the San Andreas Fault through the Bay Area trends northwest from the Santa Cruz Mountains to the western side of the San Francisco Peninsula.

In the Bay Area, the San Andreas Fault Zone was the source of the two major earthquakes in recent history that affected the San Francisco Bay region. The 1906 San Francisco earthquake was estimated at M 7.9 and resulted in approximately 290 miles of surface fault rupture, the longest of any known continental strike-slip fault. Horizontal displacement along the fault approached 17 feet near the epicenter. The 1989 Loma Prieta earthquake, with a magnitude of Mw 6.9, was centered in the Santa Cruz Mountains and resulted in widespread damage throughout the Bay Area. In 2008, the Working Group identified the San Andreas Fault as having a 21 percent chance of generating one or more earthquakes of magnitude 6.7 or greater by approximately 2037.¹³

¹¹ City of Pleasanton. 2011. Draft Supplemental Environmental Impact Report. City of Pleasanton Housing Element and Climate Action Plan General Plan Amendment and Rezoning. September.

¹² Ibid.

¹³ City of Pleasanton. 2011. Draft Supplemental Environmental Impact Report. City of Pleasanton Housing Element and Climate Action Plan General Plan Amendment and Rezoning. September.

Seismic Hazards

Potential seismic hazards resulting from a nearby moderate to major earthquake can be classified as primary and secondary. The primary effect is ground rupture, also called surface faulting. The common secondary seismic hazards include ground shaking, ground lurching, soil liquefaction, and lateral spreading. These hazards are discussed individually below.

Surface Fault Rupture

Seismically induced ground rupture is defined as the physical displacement of surface deposits in response to an earthquake's seismic waves. The magnitude and nature of fault rupture can vary for different faults or even along different strands of the same fault. Ground rupture is considered more likely along active faults. The Calaveras Fault and its associated Alquist-Priolo Earthquake Fault Zone intersect the city limits along its western boundary. It underlies the western portion of Site 22 (Merritt), is just to the west of Site 2 (Stoneridge Shopping Center, Mall), and approximately .75 mile west of Site 3. The Pleasanton Fault and its associated Alquist-Priolo Earthquake Fault Zone are just north of the city limits and is just northwest of Site 29 (Oracle), approximately 0.3-mile northwest of Site 9, approximately .50 mile west of Site 11, and approximately .75 mile southeast of Site 23 (Sunol Boulevard) and 24 (Sonoma Drive Area) (Exhibit 3.6-2). None of the rest of the sites are within one mile of a Alquist-Priolo Earthquake Fault Zone. Because Site 22 (Merritt) is underlain by the Alquist-Priolo Earthquake Fault Zone and Site 2 (Stoneridge Shopping Center, Mall) is just to the east of the fault there is a risk of ground rupture at these sites.

Ground Shaking

As discussed above, a major earthquake is likely to affect the city within the next 30 years and would likely produce strong ground shaking effects throughout the region. Earthquakes on active or potentially active faults could produce a range of ground shaking intensities, depending on their magnitude and distance from the city. Historically, earthquakes have caused strong ground shaking and damage in the Bay Area, the most recent being the M 6.9 Loma Prieta earthquake in October 1989.¹⁴

A primary tool that seismologists use to describe ground shaking hazard is a probabilistic seismic hazard assessment (PSHA). The PSHA for the State of California takes into consideration the range of possible earthquake sources and estimates their characteristic magnitudes to generate a probability map for ground shaking. The PSHA maps depict values of PGA that have a 10 percent probability of being exceeded in 50 years (a 1 in 475 chance in any one year). This probability level allows engineers to design buildings for ground motions that have a 90 percent chance of not occurring in the next 50 years, making buildings safer than if they were simply designed for the most likely events. The PSHA indicates that in the city, there is a 10 percent chance of exceeding PGA values of approximately 0.68g over the next 50 years.¹⁵ As indicated in Table 3.6-1, these PGAs could result in

¹⁴ City of Pleasanton. 2011. Draft Supplemental Environmental Impact Report. City of Pleasanton Housing Element and Climate Action Plan General Plan Amendment and Rezoning. September.

¹⁵ Peterson, M.D., Bryant, W.A., Cramer, C.H., originally published in 1996 and updated in 2003. Probabilistic Seismic Hazard Assessment for the State of California, California Division of Mines and Geology Open-File Report issued jointly with U.S. Geological Survey, CDMG OFR 96-08 and USGS OFR 96-706.

considerable damage even in specially designed structures, causing partial collapse of some buildings and damaging underground utilities.

As shown on Exhibit 3.6-3, Sites 2 (Stoneridge Mall), 3 (PUSD-Donlon), 4 (Owens), 5 (Laborers Council), 6 (Signature Center), 22 (Merritt), 23 (Sunol Boulevard), and 24 (Sonoma Drive Area) are located within areas where ground shaking hazard is within “violent” range and the rest of the sites are within the “severe” shaking range. Damage resulting from severe ground shaking would be moderate to heavy while damage due to violent ground shaking would be heavy. The intensity of earthquake ground shaking in any one area varies for several reasons: (1) the magnitude of the earthquake, (2) the distance from the site of the fault source, (3) the direction of propagation of the rupture, (4) soil saturation or groundwater, and (5) the type of geologic materials underlying the site, with stronger shaking occurring on softer soils.

Earthquake-Induced Landslides and Slope Instability

Seismic ground shaking can also result in landslides and other slope instability. Slope stability is affected by several interrelated factors, such as steepness, weak unconsolidated soil units, high clay content formations, water saturation, vegetation removal, and seismic activity. Landslides occur when slopes become unstable, and masses of material move downslope. Landslides are usually rapid and can be triggered by earthquakes. Mudslides and slumps are a shallower type of slope failure. They typically affect upper soil horizons rather than bedrock features and are more common.

As shown in Exhibit 3.6-4, aside from Sites 1 (Lester), 22 (Merritt), 23 (Sunol Boulevard), 24 (Sonoma Drive Area), and 26 (St. Augustine), none of the potential sites for rezoning are within a rainfall-induced landslide hazard zone. The western portion of Site 1 (Lester) is within a “most landslides” hazard zone while the eastern portion of the site is within the “few landslides” hazard zone. The western portion of Site 22 (Merritt) is within a most landslides hazard zone while the eastern portion of the site is not within a landslides hazard zone. Portions of Sites 23 (Sunol Boulevard) and 24 (Sonoma Drive Area) are within a few landslides hazard zone and the entirety of Site 26 (St. Augustine) is within a few landslides hazard zone.

Earthquake-Induced Settlement

Settlement of the ground surface can be accelerated and accentuated by earthquakes. During an earthquake, settlement can occur because of the relatively rapid compaction and settling of subsurface materials (particularly loose, uncompacted sandy sediments above the water table) due to the rearrangement of soil particles during prolonged ground shaking. Settlement can occur both uniformly and differentially (i.e., where adjoining areas settle at different amounts). Areas underlain by artificial fill or relatively loose alluvial sediments would be susceptible to this type of settlement. Given the geologic setting underlying the city, the potential sites for rezoning could be subjected to earthquake-induced settlement.

Lateral Spreading

Liquefaction-induced lateral spreading generally occurs on gentle slopes of 0.3 to 3 percent underlain by loose sands and a shallow water table. When liquefaction occurs because of an earthquake, unsaturated topsoil can slide as an intact block over a lower, liquefied layer. Displaced

soil proceeds downslope or toward a steep free face, such as a stream bank or road cutting. Geologic conditions conducive to lateral spreading are frequently found along streams and other waterfronts.

Liquefaction

Liquefaction occurs when loose sand and silt that is saturated with water behaves like a liquid when shaken by an earthquake, removing structural support. As such, liquefaction is more likely to occur in areas with a shallow water table. As shown in Exhibit 3.6-5, Sites 2 (Stoneridge Shopping Center, Mall) 3 (PUSD-Donlon), 4 (Owens, Motel 6 and Tommy T), 5 (Laborer Council), 6 (Signature Center), 7 (Hacienda Terrace), 8 (Muslim Community Center), 9 (Metro 580), 11 (Old Santa Rita Area), 12 (Pimlico Area, North side), 14 (St. Elizabeth Seton), 15 Rheem Drive Area, southwest side), 16 (Tri-Valley Inn), 18 (Valley Plaza), 19 (Black Avenue), 20 (Boulder Court), 21a and b (Kiewit), as well as the southern boundary of Site 1 (Lester), the eastern portion of Site 22 (Merritt, the portion not within the very low earthquake liquefaction potential), and portions of Sites 23 (Sunol Boulevard) and 25 (PUSD-District) the portions not within the very low earthquake liquefaction potential), are within areas susceptible to moderate liquefaction during an earthquake; Sites 24 (Sonoma Drive Area) and 26 (St. Augustine), the northern portion of Site 1 (Lester, the portion not within the moderate earthquake liquefaction potential) and portions of Sites 1 (Lester), 22 (Merritt), 23 (Sunol Boulevard), and 25 (PUSD-District) are within areas susceptible to very low earthquake liquefaction potential.

Soils

Expansive or Corrosive Soils

Expansive soils contain high proportions of clay and alternately absorb and release large amounts of water across wet and dry cycles. When structures are built on expansive soil, foundations may rise during the wet season, resulting in cracked foundations, distorted frameworks, and warped windows and doors. These adverse effects can be eliminated by recognition of expansive soils and application of remedial measures for site development and foundation design.

The following description of linear extensibility (also known as shrink-swell potential or expansive potential) is provided under the Glossary tab on the NRCS Web Soil Survey:

[Linear extensibility] refers to the change in length of an unconfined clod as moisture content is decreased from a moist to a dry state. Linear extensibility is used to determine the shrink-swell potential of soils. It is an expression of the volume change between the water content of the clod at 1/3- or 1/10- bar tension and oven dryness. Volume change is influenced by the amount and type of clay minerals in the soil. The volume change is the percent change for the whole soil. If it is expressed as a fraction, the resulting value is coefficient of linear extensibility.

The California Building Standards Code (CBC) includes minimum requirements for construction on expansive soils. Several city residences constructed in the 1970s and early 1980s have since suffered some structural and foundation damage due to expansive soils. As a result, the City has adopted policies which now require a soil engineer's report for development in areas of moderate to highly expansive soils, and all buildings in these areas must be constructed according to the engineer's recommendations. The engineer must also inspect piers and foundations for compliance with the recommendations. Where specific geotechnical reports identify expansive soils, they must address

how those soils may impact development. Where warranted, these reports must include mitigation, such as over-excavating expansive soils and replacing them with suitable materials.¹⁶

Soil Erosion

Erosion refers to the wearing away of soil and rock by water and wind through processes such as mass wasting and the action of waves, wind, and underground water. Excessive soil erosion can eventually lead to damage of building foundations and roadways. Areas that are susceptible to erosion are those that would be exposed during the construction phase of individual development projects and activities facilitated by those projects. Typically, the soil erosion potential is reduced once the soil is graded and covered with concrete, structures, asphalt, or slope protection. The potential for substantial or accelerated soil erosion could only be determined as part of site-specific evaluations for development.¹⁷

Settlement

Settlement can occur from immediate settlement, consolidation, or shrinkage of expansive soil. Immediate settlement occurs when a load from a structure or placement of new fill material is applied, causing distortion in the underlying materials. This settlement occurs quickly and is typically complete after placement of the final load. Consolidation settlement occurs in saturated clay from the volume change caused by squeezing out water from the pore spaces. Consolidation occurs over a period of time and is followed by secondary compression, which is a continued change in void ratio under the continued application of the load. Rapid settlement can occur if soil is liquefied during an earthquake.¹⁸

Soils tend to settle at different rates and by varying amounts depending on the load weight or changes in soil properties over an area, which is referred to as differential settlement. The southern and eastern portions of the city are underlain by artificial fills, which vary in thickness and are known to experience consolidation settlement and secondary compression. The potential hazard of settlement and differential settlement can only be determined on a site-by-site basis from a site-specific study of underlying materials.¹⁹

Alameda County

Different soil types exist within Alameda County that are closely associated with alluvial action and deposition. The Bay Plain and the valley areas of Alameda County are underlain by Quaternary deposits which, in turn, are underlain by sedimentary metamorphic and igneous rocks of up to 150 million years in age. The Quaternary deposits consist primarily of alluvial and estuarine sediments.²⁰ The alluvial sediments range from stream deposited sand to clays and intermixtures to fine windblown sand. Estuarine sediments consist of silty clays and some sand and shell layers deposited in the bay and marshlands. Adjacent to San Francisco Bay, the younger alluvial deposits transition

¹⁶ City of Pleasanton. 2009. Pleasanton General Plan 2005-2025, Public Safety Element. July 21

¹⁷ City of Pleasanton. 2011. Draft Supplemental Environmental Impact Report. City of Pleasanton Housing Element and Climate Action Plan General Plan Amendment and Rezoning. September.

¹⁸ Ibid.

¹⁹ Ibid.

²⁰ County of Alameda. 2014. Alameda County General Plan, Safety Element.

into younger bay mud.²¹ These fertile silts and clays pose some risk to structures, as they can be expansive and cause significant damage.

Paleontological Resources

Fossil remains are found in the geologic deposits (sedimentary rock formations) within which they were originally buried. A paleontologically important deposit is one that has a high probability of producing unique, scientifically important fossils. This is determined by the abundance and densities of fossil specimens and/or previously recorded fossil sites exposed in the deposit. Therefore, the potential paleontological sensitivity of a site can be assessed by identifying the paleontological importance of geologic deposits within the site.

City of Pleasanton

The city is directly underlain by Quaternary Alluvium, which is unlikely to contain vertebrate fossils. However, it is possible that the city is also underlain by older Quaternary deposits that are known to contain vertebrate fossils. Fossils have been found within five miles of areas in similar deposits. Therefore, the city has moderate paleontological sensitivity. While shallow excavation or grading is unlikely to uncover paleontological resources, deeper excavation into older sediments may uncover significant fossils.²²

3.6.3 - Regulatory Framework

Federal

National Earthquake Hazards Reduction Program

The National Earthquake Hazards Reduction Program (NEHRP) was established by the United States Congress when it passed the Earthquake Hazards Reduction Act of 1977, Public Law 95–124. In establishing the NEHRP, Congress recognized that earthquake-related losses could be reduced through improved design and construction methods and practices, land use controls and redevelopment, prediction techniques and early warning systems, coordinated emergency preparedness plans, and public education and involvement programs. The four basic goals remain unchanged:

- Develop effective practices and policies for earthquake loss reduction and accelerate their implementation.
- Improve techniques for reducing earthquake vulnerabilities of facilities and systems.
- Improve earthquake hazards identification and risk assessment methods, and their use.
- Improve the understanding of earthquakes and their effects.

Several key federal agencies contribute to earthquake mitigation efforts. There are four primary NEHRP agencies:

²¹ Ibid.

²² City of Pleasanton. 2011. Draft Supplemental Environmental Impact Report. City of Pleasanton Housing Element and Climate Action Plan General Plan Amendment and Rezoning. September.

- National Institute of Standards and Technology of the Department of Commerce
- National Science Foundation
- United States Geological Survey of the Department of the Interior
- Federal Emergency Management Agency (FEMA) of the Department of Homeland Security

Implementation of NEHRP priorities is accomplished primarily through original research, publications, and recommendations to assist and guide State, regional, and local agencies in the development of plans and policies to promote safety and emergency planning.

National Pollutant Discharge Elimination System

The National Pollutant Discharge Elimination System (NPDES) Permit Program, authorized by Section 402(p) of the federal Clean Water Act, controls water pollution by regulating point sources, such as construction sites and industrial operations that discharge pollutants into waters of the United States. A Storm Water Pollution Prevention Plan (SWPPP) is required to control discharges from a project site, including soil erosion, to protect waterways. A SWPPP describes the measures or practices to control discharges during both the construction and operational phases of the project. A SWPPP identifies project design features and structural and nonstructural Best Management Practices (BMPs) that will be used to control, prevent, remove, or reduce stormwater pollution from a site, including sediment from erosion.

Excavation Rules and Regulations

Title 29 in the Code of Federal Regulations, Part 1926, Subpart P contains rules and regulations for site excavations. Subpart P applies to all open excavations made in the earth's surface. Specific excavation requirements regulate surface encumbrances, underground installations, access and egress, hazardous atmospheres, stability of structures, protection of employees from loose rock or soil, inspections, and walkthroughs.

Paleontological Resources Preservation Act

The Paleontological Resources Preservation Act of 2002 codifies the generally accepted practice of limited vertebrate fossil collection and limited collection of other rare and scientifically significant fossils by qualified researchers. Researchers must obtain a permit from the appropriate State or federal agency and agree to donate any materials recovered to recognized public institutions, where they would remain accessible to the public and other researchers.

Society of Vertebrate Paleontology Guidelines

The Society of Vertebrate Paleontology, a national scientific organization of professional vertebrate paleontologists, has established standard guidelines that outline acceptable professional practices in the conduct of paleontological resource assessments and surveys, monitoring and mitigation, data and fossil recovery, sampling procedures, specimen preparation, analysis, and curation. Most practicing professional paleontologists in the nation adhere to the Society of Vertebrate Paleontology's assessment, mitigation, and monitoring requirements, as specifically spelled out in its standard guidelines.

State

Alquist-Priolo Earthquake Fault Zoning Act

The Alquist-Priolo Earthquake Fault Zoning Act (Public Resources Code [PRC] Sections 2621 to 2630) was passed in 1972 to provide a statewide mechanism for reducing the hazard of surface fault rupture to structures used for human occupancy. The main purpose of the Act is to prevent the siting of buildings used for human occupancy across the traces of active faults. It should be noted that the Act addresses the potential hazard of surface fault rupture and is not directed toward other earthquake hazards, such as seismically induced ground shaking or landslides.

The law requires the State Geologist to identify regulatory zones (known as Earthquake Fault Zones or Alquist-Priolo Zones) around the surface traces of active faults, and to depict these zones on topographic base maps, typically at a scale of 1 inch to 2,000 feet. Earthquake Fault Zones vary in width, although they are often 0.75-mile wide. Once published, the maps are distributed to the affected cities, counties, and State agencies for their use in planning and controlling new or renewed construction. Except for single-family wood-frame and steel-frame dwellings that are not part of a larger development (i.e., four units or more), local agencies are required to regulate development within the mapped zones. In general, construction within 50 feet of an active fault zone is prohibited.

Seismic Hazards Mapping Act

The Seismic Hazards Mapping Act (PRC §§ 2690–2699.6), which was passed in 1990, addresses earthquake hazards other than surface fault rupture. These hazards include strong ground shaking, earthquake-induced landslides, liquefaction, or other ground failures. Much like the Alquist-Priolo Earthquake Fault Zoning Act discussed above, these seismic hazard zones are mapped by the State Geologist to assist local government in the land use planning process. The Act states, “it is necessary to identify and map seismic hazard zones in order for cities and counties to adequately prepare the safety element of their general plans and to encourage land use management policies and regulations to reduce and mitigate those hazards to protect public health and safety.” The Act also states, “cities and counties shall require, prior to the approval of a project located in a seismic hazard zone, a geotechnical report defining and delineating any seismic hazard.”

California Building Code

The State of California provides minimum standards for building design through the CBC (California Code of Regulations [CCR], Title 24). Where no other building codes apply, Chapter 29 regulates excavation, foundations, and retaining walls. The CBC applies to building design and construction in the State and is based on the federal Uniform Building Code (UBC) used widely throughout the country (generally adopted on a state-by-state or district-by-district basis). The CBC has been modified for California conditions with more detailed and/or more stringent regulations.

The State earthquake protection law (California Health and Safety Code § 19100 *et seq.*) requires that structures be designed to resist stresses produced by lateral forces caused by wind and earthquakes. Specific minimum seismic safety and structural design requirements are set forth in Chapter 16 of the CBC. The CBC identifies seismic factors that must be considered in structural design. Chapter 18 of the CBC regulates the excavation of foundations and retaining walls, and

Appendix Chapter A33 regulates grading activities, including drainage and erosion control and construction on unstable soils, such as expansive soils and areas subject to liquefaction.

The CBC is updated every 3 years, and the current 2019 CBC took effect on January 1, 2020. The California Building Standards Commission published the 2022 CBC on July 1, 2022, and it will take effect on January 1, 2023.²³ The City has adopted the 2019 CBC as the “Pleasanton Building Code.”²⁴

California Public Resources Code

Section 5097 of the California Public Resources Code specifies procedures for unexpected discovery of paleontological resources. Section 5097.5 of the Code states that no person shall knowingly and willfully excavate upon, or remove, destroy, injure, or deface any vertebrate paleontological site, including fossilized footprints, inscriptions made by human agency, or any other paleontological feature, situated on public lands, except with express permission of the public agency having jurisdiction over such lands.

Local

City of Pleasanton

City of Pleasanton General Plan

The following goals, policies, and programs provided in Chapter 5, Public Safety Element, of the General Plan are applicable relate to geology and soils:

Seismic Safety

- Goal 1** Minimize the risks to lives and property, and minimize the potential for liability to the due to seismic activity within the Planning Area.
- Policy 1** Restrict development in areas prone to seismic safety hazards.
- Program 1.1** Comply with the *Alquist-Priolo Act* and other seismic safety criteria established by the City of Pleasanton.
- Program 1.2** Prohibit construction of habitable structures within at least 50 feet of an identified active fault trace where the fault has been specifically located in site-specific geologic studies.
- Program 1.3** Prohibit construction of a habitable structure within at least 100 feet of the most likely line of the fault trace, if the active fault trace is approximately located, concealed or inferred. The applicant’s geologist (with concurrence from the City’s peer review geologist) shall identify the most likely line of the fault trace. This program applies only to new development approved after date of adoption and does

²³ California Department of General Services Building Standards Commission. 2022 California Building Code. Website: <https://www.dgs.ca.gov/BSC#>. Accessed March 30, 2022.

²⁴ Pleasanton Municipal Code. Chapter 20.08.010 California Building Code adopted. Website: https://library.qcode.us/lib/pleasanton_ca/pub/municipal_code/item/title_20-chapter_20_08?view=all#title_20-chapter_20_08-20_08_010. Accessed March 30, 2022.

not make non-conforming those structures approved under policies and regulations allowing structures at least 50 feet from a fault trace.

- Program 1.4** Prohibit construction of facilities and systems vital to the public health and safety (e.g., water facilities, fire stations, hospitals, communication facilities, etc.) within the Alquist-Priolo Earthquake Fault Zones.
- Policy 2** Investigate the potential for seismic hazards during the development review process, and implement soils engineering and construction standards which minimize potential danger from earthquakes.
- Program 2.1** Require site-specific soils, geologic, and/or geotechnical engineering studies prior to development approval of structures for human occupancy for any project proposed within areas shown on current Alquist-Priolo Earthquake Fault Zones Maps. For development within areas identified as severe through violent seismic shaking amplification (Figure 5-3 of the General Plan: Relative Intensity of Ground Shaking) outside of the Alquist-Priolo Earthquake Fault Zone, the site-specific soils and/or geotechnical report shall address the impacts of seismic ground shaking on proposed structures, infrastructure, and ground stability.
- Program 2.2** Design and construct all structures to address potential seismic and geologic hazard conditions according to the California Building Standards Code (CBC) standards or more stringent standards. All structures and facilities not addressed by the CBC shall be designed and constructed to mitigate potential seismic and geologic hazards as recommended by site-specific soils, geologic, and/or geotechnical engineering studies.
- Program 2.3** Design new utility lines that cross an active fault trace with appropriate engineering and design mitigations as recommended by site-specific soils, geologic, and/or geotechnical engineering studies.
- Program 2.4** Design new bridges and retrofit existing bridges with appropriate engineering and design mitigations in accordance with Caltrans standards.
- Program 2.5** Require technical review and analysis of soils, geologic, and geotechnical studies by a qualified consulting Engineering Geologist reporting to the City of Pleasanton. Incorporate the recommendations of the City's consulting engineer into the project design.
- Program 2.6** Require professional inspection of foundations, piers, excavation, earthwork, and other aspects of site development during construction. Ensure that all mitigations recommended by the City's consulting engineer are incorporated into the project construction.
- Policy 3** Require post-earthquake construction, if needed, to conform to all City codes and ordinances.

Program 3.1 Require building permits and enforce all current building requirements and codes for post-earthquake construction.

Geologic Hazards

Goal 2 Minimize the risks to lives and property, and to minimize potential liability to the City, due to geologic hazards within the Planning Area.

Policy 5 Investigate the potential for geologic hazards as part of the development review process, and maintain this information for the public record.

Program 5.1 Require site-specific soils studies for all new development prior to the issuance of building permits and prior to the approval of final improvement plans. Where there is risk of geologic hazards, the soil study should address seismic shaking, lateral spreading, differential settlement, lurch cracking, liquefaction, erosion, and expansive soils.

Program 5.2 Require site-specific geologic and/or geotechnical engineering studies prior to development approval where there is risk of the following geologic hazards: surface fault rupture, bank failures, rock falls, landslides, and for areas with slopes equal to or greater than 20 percent.

Program 5.3 Require measures to mitigate potential geologic safety hazards during adverse conditions such as saturated soils and ground shaking, and during grading of the site for roads, installation of infrastructure, and creation of building pads. Mitigation measures identified by the site engineering studies shall be incorporated into the project design.

Program 5.4 Require technical review and analysis of geotechnical studies by a qualified consulting Geotechnical Engineer reporting to the City. Incorporate the recommendations of the City's consulting engineer into the project design.

Program 5.5 Discourage development in areas with a high risk of geologic hazards as identified by a California licensed Engineering Geologist representing the City. Allow development only when geologic and soils investigations demonstrate that hazards can be mitigated by accepted engineering and construction techniques. Mitigation measures identified by the investigations shall be incorporated into the project design and subject to approval by the City's reviewing geologist/engineer.

Policy 6 Restrict new development of sites with structures intended for human occupancy in any landslide prone or unstable area.

Program 6.1 Prohibit new development of sites with structures intended for human occupancy in any landslide prone areas unless the landslide risk can be eliminated. Permit development in landslide prone areas only when sites can be shown to be stable during adverse conditions such as saturated soils, ground shaking, and during grading of the site for roads, installation of infrastructure, and creation of building

pads. Engineering studies shall demonstrate that structures in landslide prone areas would sustain no more damage due to slope instabilities than damage sustained by a similar building in the Pleasanton Planning Area constructed to current CBC standards and located on soils with a low susceptibility to failure when exposed to moderate ground shaking.

Program 6.2 Require developers to include drainage, erosion, and landslide mitigation measures to reduce landslide potential.

Program 6.3 Design irrigation systems to minimize the potential for soil saturation, excessive runoff, and other factors deemed to contribute to slope instability.

Program 6.4 Design grading plans to minimize earthmoving activity and site grading in areas of potential land instability and in areas identified as having “Mostly landslides,” as shown on Figure 5-1 of the General Plan.

Program 6.5 Establish Geologic Hazard Abatement Districts (GHADs) in areas of new development where landslide risks or other geologic hazards are known to exist, to assure that ongoing monitoring and maintenance of slopes and drainage facilities occurs. GHADs should be considered for hillside development such as west of Foothill Road and other areas prone to seismic, landslide, and other geologic hazards.

Program 6.6 In unstable areas, prohibit major grading where existing slopes are 25 percent or greater.

Policy 7 Implement standards to assist City decision-makers in the evaluation of development proposals and management of geologic hazard areas.

Program 7.1 Maintain a list of pre-qualified geologic, geotechnical, soils, and structural engineering firms acceptable to the City as reviewing consultants.

Program 7.3 Adopt updates to the California Building Code and other safety standards in a timely manner.

Program 7.4 Develop a grading ordinance which establishes criteria for evaluating and controlling grading due to development.

Vineyard Avenue Corridor Specific Plan

Geological Requirements Related to Construction: Due to the unique geological conditions present in the Vineyard Avenue Corridor Specific Plan Area, a series of site-specific studies and mitigation measures for future development will be necessary. These include the following:

- a. All structures and constructed slopes shall be designed in accordance with the most recent UBC as modified by the California Code of Regulations. A soils and geotechnical report shall be prepared for each individual development (unless otherwise approved by the City Engineer) within the Vineyard Avenue Corridor Specific Plan Area. Analysis presented in the

geotechnical report shall conform with the California Division of Mines and Geology recommendations presented in the guidelines for Evaluating Seismic Hazards in California. Projects located within the alluvial deposit areas of the project site shall specifically address and be designed to withstand the potential for liquefaction. Projects within the upland areas or adjacent to steep slopes of upland areas shall specifically address the potential for seismically induced landsliding. The report shall be submitted to the City for review by a qualified consulting Geotechnical Engineer reporting to the City at the applicant's cost. The project shall incorporate all recommendations of the City's consulting engineer into the design.

- b. For areas with slopes steeper than 20 percent or within or adjacent to existing landslides, a slope stability analysis report (addressing static and pseudo-static conditions) shall be prepared by a licensed Civil Engineer and include the appropriate recommendations from the approved geotechnical report for any proposed development or roadway construction. The report shall provide recommendations for control of surface drainage, adequate groundwater drainage, and slide mass removal or stabilization, if necessary. The analysis shall be supported by investigation of site-specific conditions that shall include but not be limited to:
 - estimated recency of slope failures and potential for continued movement;
 - depth of landslides or colluvial deposits and characterization of slide plane(s);
 - shear strength data for subsurface materials at the project site;
 - location of springs;
 - groundwater level detail that characterizes seasonal fluctuations; and
 - justification of the seismic coefficient used in pseudo-static analysis.
- c. Proposed cut-and-fill slope designs shall have factors of safety not lower than 1.5 under static conditions and 1.0 under seismic shaking conditions.
- d. All grading plans, cut-and-fill slopes, compaction procedures, and retaining structures shall be designed by a licensed Geotechnical or Civil Engineer. All grading and slope preparation activities shall be conducted under the supervision of a licensed Geotechnical Engineer or certified Engineering Geologist.
- e. To the extent possible, grading plans shall minimize earthmoving and site grading. Development design shall avoid placing structures and utilities on or near the tops of slopes or in the shallow subsurface of slopes.
- f. The final geotechnical report for the grading plan for proposed projects shall be prepared by a professional engineer and approved by the City Engineer. The report shall address the potential for delayed (differential settlement) consolidation within deep fills and associated land surface subsidence. The report shall provide specific recommendations for:
 - Fill compaction specifications that consider the likelihood of eventual saturation and wetting and drying cycles for the fill materials.
 - Removal of colluvial material or weathered rock that may be subject to consolidation under the load of proposed fills.
 - Design that minimizes the variability of fill thickness within fills that underlie structures or other improvements at the project site.

- Design and operation of adequate subsurface drainage systems for fills (particularly beneath heavily-irrigated areas or other water sources such as summing pools or detention basins). Drainage systems for fills shall be designed to minimize maintenance and ensure long-term performance. Flow from the drainage system shall be controlled so as not to cause or contribute to erosion of existing drainage channels.
- g. On expansive soils with moderately high shrink-swell potential (Perkins loam and Pleasanton and Positas gravelly loam), building foundations and improvements shall consist of drilled pier and grade beams, deepened footings (extending below expansive soil), or post-tensioned slabs. Alternatively, expansive soil shall be removed and replaced with compacted non-expansive soils prior to foundation construction. The geotechnical report for each phase of the project shall require that subgrade soils for pavements consist of moisture-conditioned, lime-treated, or non-expansive soil, and that surface (including roof drainage) and subsurface water be directed away from foundation elements to minimize variations in soils moisture.
- h. Improvements proposed to be placed on slopes greater than 10 percent, or within 10 feet of the tops of such slopes, shall be approved for construction by a California licensed Geotechnical Engineer or California certified Engineering Geologist. The City shall approve grading plans and slope designs prior to implementation.

Pleasanton Municipal Code

City of Pleasanton Building Code

The City has adopted the 2019 California Building Code as the “Pleasanton Building Code” (Chapter 20.08 of the Pleasanton Municipal Code) together with additions, amendments and repeals that reflect building conditions and structural requirements within the. Chapter 18 of the California Building Code requires a geotechnical foundation investigation during the project planning phase for new construction intended for human occupancy. The recommendations of the foundation and structural reports prepared for the construction of the project or equivalent measures are incorporated in the final design of each structure. Earthquake resistant design and materials must meet or exceed current seismic engineering standards. Chapter 20.04 further requires soil investigation reports for building plans.

3.6.4 - Impacts and Mitigation Measures

Significance Criteria

The City is utilizing the questions in Appendix G of the State California Environmental Quality Act (CEQA) Guidelines to establish thresholds of significance for this project. To determine whether impacts to geology and soils have significant environmental effects, the following questions are analyzed and evaluated.

Would the Housing Element Update:

- a) Directly or indirectly cause potential substantial adverse effects, including the risk of loss, injury or death involving:

- i. Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault? Refer to Division of Mines and Geology Special Publication 42.
 - ii. Strong seismic ground shaking?
 - iii. Seismic-related ground failure, including liquefaction?
 - iv. Landslides?
- b) Result in substantial soil erosion or the loss of topsoil?
 - c) Be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse?
 - d) Be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating substantial direct or indirect risks to life or property?
 - e) Have soils incapable of adequately supporting the use of septic tanks or alternative wastewater disposal systems where sewers are not available for the disposal of wastewater?
 - f) Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?

Approach to Analysis

Impacts related to geology, soils, and paleontological resources resulting from implementation of development consistent with the Housing Element Update are discussed below. The following impact analysis is based on a review of published information, surveys, and reports regarding regional geology and soils and paleontology. Information was obtained from private and governmental agencies and Internet websites, including the CGS and the USGS.

Geology, soils, and seismicity impacts associated with the development on the Dublin-Pleasanton Bay Area Rapid Transit (BART) property were fully evaluated in the 2015-2023 (5th Cycle) Housing Element Draft Supplemental Environmental Impact Report (State Clearinghouse [SCH] No. 2011052002), and no additional impacts related to geology, soils, and seismicity are associated with the Housing Element Update; therefore, this analysis does not include that site.

Impact Evaluation

Earthquakes

Impact GEO-1: Development consistent with the Housing Element Update, rezonings, General Plan and Specific Plan Amendments would not directly or indirectly cause potential substantial adverse effects, including the risk of loss, injury or death involving:

- i) **Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault? Refer to Division of Mines and Geology Special Publication 42.**

- ii) **Strong seismic ground shaking.**
- iii) **Seismic-related ground failure, including liquefaction.**
- iv) **Landslides.**

Development consistent with the Housing Element Update would result in additional development on the potential sites for rezoning. Most of the potential sites for rezoning are infill sites; thus, new development would primarily occur on parcels that already contain existing residential or commercial structures.

Given the city's proximity to active faults as described above, it is likely that the potential sites for rezoning would experience periodic minor to strong earthquake motion. As such, additional residents would potentially be exposed to the effects of surface fault rupture, seismic ground shaking, liquefaction, settlement, and landslides from local and regional earthquakes. Structures that would be built on steep slopes could be exposed to an existing risk of landslide or, if improperly constructed, could exacerbate existing landslide conditions. New structures built under the Housing Element Update could also experience substantial damage during seismic events. The Housing Element Update identifies sites that could accommodate residential development but does not describe specific development projects that would be undertaken during the 8-year planning horizon. Creating development assumptions without project plans regarding size and scope would be too speculative. Further, there is no certainty that any of the properties will be developed, or when the development might occur. Thus, estimating project-specific impacts would involve unreasonable speculation. As discussed below, policies and programs included in the General Plan, as well as the rules and regulations of the Municipal Code and California law, address potential impacts related to surface fault rupture, seismic shaking, seismic-related ground failure, and landslides.

i) Surface Fault Rupture

The CGS has delineated an Alquist-Priolo Earthquake Fault Zone associated with the Calaveras Fault on the Dublin and Livermore Regulatory Maps^{25, 26} As shown in Exhibits 3.6-1 and 3-6.2, the Calaveras Fault and its associated Alquist-Priolo Earthquake Fault Zone intersect the city limits along its western boundary. It underlies the western portion of Site 22 (Merritt), is just to the west of Site 2 (Stoneridge Shopping Center, Mall), and approximately .75 mile west of Site 3 (PUSD-Donlon). The Pleasanton Fault and its associated Alquist-Priolo Earthquake Fault Zone are just north of the city limits and just northwest of Site 29 (Oracle), approximately 0.3 mile northwest of Site 9 (Metro 580), approximately 0.5 mile west of Site 11 (Old Santa Rita Area), and approximately 0.75 mile southeast of Site 23 (Sunol Boulevard) and 24 (Sonoma Drive Area) (Exhibit 3.6-2). The Verona Fault and its associated Alquist-Priolo Earthquake Fault Zone is at the southern city limits, approximately .70 mile south of Sites 23 (Sunol Boulevard) and 24 (Sonoma Drive Area), approximately .90 mile south of Site 25 (PUSD-District), and approximately 1 mile south of Site 26 (St. Augustine). None of the rest of the sites are within 1 mile of a Alquist-Priolo Earthquake Fault Zone. Because portions of Site 22 (Merritt) are underlain by an Alquist-Priolo Earthquake Fault Zone and Site 2 (Stoneridge Shopping Center, Mall) is just to the east of the fault zone, there is a risk of ground rupture at these sites. Given the

²⁵ California Geological Survey (CGS). 2022. Earthquake Zones of Required Investigation Dublin Quadrangle: Earthquake Fault Zones and Seismic Hazard Zones January 1, 1982 (Earthquake Fault Zones) and August 27, 2008 (Seismic Hazard Zones). Website: <https://maps.conservation.ca.gov/cgs/informationwarehouse/regulatorymaps/>. Accessed April 13, 2022.

²⁶ Ibid.

presence of fault zones near some of the potential sites for rezoning, in the event of a large earthquake, people, structures, and infrastructure within those land uses could be exposed to the effects of surface fault rupture.

Chapter 5 of the General Plan, Public Safety Element, includes policies and programs to minimize structural damage and minimize the exposure of people to risk of injury or death from structural failure in the event of surface fault rupture during an earthquake. Goal 1 focuses on minimizing risks to lives and property due to seismic activity. Policy 1 restricts development in areas prone to seismic safety hazards and includes programs that regulate development of habitable structures within fault zones, such as Site 22 (Stoneridge Shopping Center, Mall).

Therefore, development on the potential sites for rezoning, including Site 22 (Stoneridge Shopping Center, Mall), would comply with the restrictions included within the programs in Policy 1, such as Program 1.2, which prohibits construction of habitable structures within at least 50 feet of an identified active fault trace and Program 1.3, which prohibits construction of habitable structures within at least 100 feet of the most likely line of the fault trace. Compliance with these programs would be confirmed during the development review process. Policy 2 requires investigation of potential for seismic hazards during the development review process and implementation of soils engineering and construction standards to minimize potential dangers from earthquakes. The programs applicable to the Housing Element Update included in Policy 2 (including, but not limited to, Program 2.1, 2.2, 2.3, 2.5, and 2.6) require site-specific soils, geologic, and/or geotechnical engineering studies prior to development approval for habitable structures within Alquist-Priolo Earthquake Fault Zones, the design of buildings and infrastructure within applicable standards, review of reports and plans by the City Engineer, and professional inspections during construction. Goal 2 focuses on minimizing risks to lives and property due to geologic hazards. Policy 5 requires investigation of potential for geologic hazards during the development review process and implementation of soils engineering and construction standards to minimize potential dangers from earthquakes. The applicable programs included in Policy 5 (Program 5.1, 5.2, 5.3, 5.4, and 5.5) require site-specific soils study prior to the issuance of building permits and prior to the approval of final improvement plans and a site-specific geologic and/or geotechnical engineering study where there is risk of surface fault rupture, bank failures, rock falls, landslides, and for areas with slopes equal to greater than 20 percent. They also require certain technical review of geotechnical studies to ensure the recommendations and mitigations provided in those studies are incorporated into project design. Accordingly, as required by Policy 2, a site-specific soils, geologic, and/or geotechnical engineering studies would be required prior to development approval of structures for human occupancy for any project proposed within Site 22 (Stoneridge Shopping Center, Mall), and, as required by Program 5.1 and 5.2, site-specific soils study and/or site-specific geologic and/or geotechnical engineering studies would be required for all individual development approval on the potential sites for rezoning and the recommendations provided by the studies would be incorporated into project design as required by Program 2.2.

Site 27 (PUSD-Vineyard) is within the Vineyard Avenue Corridor Specific Plan Area, and it would be required to abide by the applicable geological requirements related to construction as listed above in the Regulatory Framework section. Compliance with these requirements would minimize structural

damage and minimize the exposure of people to risk of injury or death from structural failure in the event of surface fault rupture during an earthquake.

Potential structural damage and exposure of people to risk of injury or death from structural failure associated with surface fault rupture would be reduced by compliance with CBC engineering design and construction measures. Foundations and other structural support features would be designed to resist or absorb damaging forces from strong ground shaking and surface fault rupture. Chapter 20.08 of the Municipal Code incorporates the most recent CBC. The Pleasanton City Building and Safety Inspection Division reviews plans and applications for site clearance, grading, and building permits to ensure compliance with Chapter 20.08 (California Building Standards Code) and imposes requirements for revisions where needed to ensure that new or significantly remodeled structures are constructed in compliance with the CBC, and reflect any additional measures deemed appropriate. Permit issuance would be based upon satisfactory completion of any identified applicable measures. Additionally, Chapter 17.12 (Geologic Hazards) requires the consideration of geologic hazards when considering applications and permits for new real estate developments or structures for human occupancy.

With the implementation of the policies and programs in the General Plan, as well as applicable local codes, potential impacts associated with surface fault rupture within an Alquist-Priolo Earthquake Fault Zone would be less than significant.

ii) Strong Seismic Ground Shaking

The city and its Sphere of Influence (SOI) are within a seismically active region that could experience strong ground shaking during a seismic event. As described above and provided in Table 3.6-2, there are several active faults near the city. The Calaveras, Hayward, and San Andreas Fault are most likely to produce the greatest level of ground shaking at the potential sites for rezoning. Table 3.6-2 also provides the estimated Mw earthquake. Much of the city is underlain by alluvial soils that could respond poorly to loading under seismic shaking or ground failure. “Violent” or “severe to violent” ground shaking is expected to occur throughout the city including at several of the potential sites for rezoning (see Exhibit 3.6-3). The intensity of ground shaking will ultimately depend on the characteristics of the fault, distance from the fault, magnitude and duration of the earthquake, and site-specific geologic conditions.

Chapter 5 of the General Plan, Public Safety Element, includes policies and programs to protect residents within the city and surrounding areas from seismically induced hazards associated with strong seismic ground shaking. Goal 1 focuses on minimizing risks to lives and property due to ground shaking associated with seismic activity. Policy 1 restricts development in areas prone to seismic safety hazards, including ground shaking, and includes programs that regulate development of habitable structures within fault zones. Policy 2 requires investigation of potential for seismic hazards during the development review process and implementation of soils engineering and construction standards to minimize potential dangers from earthquakes. The programs applicable to the Housing Element Update included in Policy 2 (including, but not limited to, Program 2.1, 2.2, 2.3, 2.5, and 2.6) require site-specific soils, geologic, and/or geotechnical engineering studies prior to development approval for habitable structures within an Alquist-Priolo Earthquake Fault Zone, the design of buildings and infrastructure within applicable standards, review of reports and plans by the

City Engineer, and professional inspections during construction. Goal 2 focuses on minimizing risks to lives and property due to geologic hazards, including ground shaking. Policy 5 requires investigation of potential for geologic hazards during the development review process and implementation of soils engineering and construction standards to minimize potential dangers from earthquakes. The applicable programs included in Policy 5 (Program 5.1, 5.2, 5.3, 5.4, and 5.5) require site-specific soils study prior to the issuance of building permits and prior to the approval of final improvement plans, as well as a site-specific geologic and/or geotechnical engineering study where there is risk of surface fault rupture, bank failures, rock falls, landslides, and for areas with slopes equal to greater than 20 percent. Applicable programs also require certain technical review of geotechnical studies to ensure the recommendations and mitigations provided in those studies are incorporated into project design. Accordingly, as required by Policy 2, a site-specific soils, geologic, and/or geotechnical engineering study would be required prior to development approval of structures for human occupancy for any project proposed within Site 22 (Merritt), and, as required by Program 5.1 and 5.2, a site-specific soils study and/or site-specific geologic and/or geotechnical engineering study would be required for all individual development projects on the potential sites for rezoning, and the recommendations provided by the studies would be incorporated into project design as required by Program 2.2.

Site 27 (PUSD-Vineyard) is within the Vineyard Avenue Corridor Specific Plan Area, and it would be required to abide by the applicable geological requirements related to construction as listed above. Compliance with these requirements would minimize structural damage and would also minimize the exposure of people to risk of injury or death from structural failure associated with seismic ground shaking during an earthquake.

Potential structural damage and exposure of people to risk of injury or death from structural failure associated with strong seismic ground shaking would be reduced by compliance with CBC engineering design and construction measures. Foundations and other structural support features would be designed to resist or absorb damaging forces from strong ground shaking. Chapter 20.08 of the Municipal Code incorporates the most recent CBC. The Pleasanton City Building and Safety Inspection Division reviews plans and applications for site clearance, grading, and building permits to ensure compliance with Chapter 20.08 (California Building Standards Code) and imposes requirements for revisions where needed to ensure that new or significantly remodeled structures are constructed in compliance with the CBC, and reflect any additional measures deemed appropriate. Permit issuance would be based upon satisfactory completion of any identified applicable measures. Additionally, Chapter 17.12 (Geologic Hazards) requires the consideration of geologic hazards when considering applications and permits for new real estate developments or structures for human occupancy.

Compliance with mandatory CBC requirements and implementation of General Plan policies and programs would ensure that future development projects are appropriately investigated in terms of potential seismic hazards and that any new buildings and structures are constructed to withstand strong seismic ground shaking. Therefore, impacts would be less than significant.

iii) and iv) Seismic-related Ground Failure, Including Liquefaction and Landslides

Secondary effects of earthquake shaking may include landslides, slope instability, liquefaction, subsidence, and lateral spreading. The Association of Bay Area Governments/Metropolitan Transportation Commission (ABAG/MTC) Hazard Viewer Map maps rainfall-induced landslide hazards. Areas identified as “most landslides” covers areas with the largest and most concentrated landslides and “few landslides” indicates smaller more scattered landslides. “Flat land” is unlikely to have a landslide event.²⁷ As shown in Exhibit 3.6-4, aside from Sites 1 (Lester), 22 (Merritt), 23 (Sunol Boulevard), 24 (Sonoma Drive Area), and 26 (St. Augustine), none of the potential sites for rezoning are located within a rainfall-induced landslide hazard zone. The western portion of Site 1 is within a most landslides hazard zone while the eastern portion of the site is within the few landslides hazard zone. The western portion of Site 22 (Merritt) is within a most landslides hazard zone while the eastern portion of the site is not within a landslides hazard zone. Portions of Sites 23 (Sunol Boulevard) and 24 (Sonoma Drive Area) are within a few landslides hazard zone and the entirety of Site 26 is within a few landslides hazard zone.

As shown in Exhibit 3.6-5, Sites 2 (Stoneridge Shopping Center, Mall), 3 (PUSD-Donlon), 4 (Owens, Motel 6 and Tommy T), 5 (Laborer Council), 6 (Signature Center), 7 (Hacienda Terrace), 8 (Muslim Community Center), 9 (Metro 580), 11 (Old Santa Rita Area), 12 (Pimlico Area, North side), 14 (St. Elizabeth Seton), 15 (Rheem Drive Area, southwest side), 16 (Tri-Valley Inn), 18 (Valley Plaza), 19 (Black Avenue), 20 (Boulder Court), 21a and b (Kiewitt), the southern boundary of Site 1 (Lester), the eastern portion of Site 22 (Stoneridge Shopping Center, Mall, the portion not within the very low earthquake liquefaction potential), portions of Site 23 (Sunol Boulevard) and 25 (PUSD-Donol) the portions not within the very low earthquake liquefaction potential), are both within areas susceptible to moderate liquefaction during an earthquake; Site 24 (Sonoma Drive Area) and 26 (St. Augustine), the northern portion of Site 1 (Lester, the portion not within the moderate earthquake liquefaction potential) and portions of Sites 1 (Lester), 22 (Merritt), 23 (Sunol Boulevard), and 25 (PUSD-District) are within areas susceptible to very low earthquake liquefaction potential. Liquefaction-induced lateral spreading could occur in the low-lying areas. As such, the development consistent with the Housing Element Update could potentially be exposed to the effects of landslides, slope instability, liquefaction, subsidence, and lateral spreading from local and regional earthquakes.

As discussed under Impacts GEO-1(i) and GEO-1(ii), policies and programs of the General Plan aim to protect residents, structures, and infrastructure from the effects of surface fault rupture and strong seismic ground shaking, and would also protect against the secondary effects of earthquake shaking. As required by Program 5.1 and 5.2, site-specific soils studies and/or site-specific geologic and/or geotechnical engineering studies would be required for all individual development approval on the potential sites for rezoning and the recommendations provided by the studies would be incorporated into project design as required by Program 2.2. In addition to the goals, policies, and programs described in Impacts GEO-1(i) and GEO-1(ii), Policy 6 restricts new development of sites with structures intended for human occupancy in any landslide prone or unstable areas. The

²⁷ Association of Bay Area Governments/Metropolitan Transit Commission (ABAG/MTC). 2020. MTC/ABAG Hazard Viewer Map. Website: <https://mtc.maps.arcgis.com/apps/webappviewer/index.html?id=4a6f3f1259df42eab29b35dfcd086fc8>. Accessed July 5, 2022.

applicable programs included in Policy 6 (Program 6.1, 6.2, 6.3, 6.4, 6.5, and 6.6) prohibit new development of sites with structures intended for human occupancy in any landslide prone areas unless the landslide risk can be eliminated and requires engineering studies to demonstrate that structures in landslide prone areas would sustain no more damage related to slope instabilities than damage sustainable by similar buildings within the city. The programs also require developments to include design features and mitigation to reduce damage associated with seismic-related ground failure and the establishment of Geologic Hazard Abatement Districts (GHADs) to ensure ongoing monitoring and maintenance of slopes and drainage facilities.

Site 27 (PUSD-Vineyard) is within the Vineyard Avenue Corridor Specific Plan Area, and it would be required to abide by the applicable geological requirements related to construction as listed above. Compliance with these requirements would minimize structural damage and minimize the exposure of people to risk of injury or death from seismic-related ground failure, including liquefaction and landslides.

Furthermore, any development consistent with the Housing Element Update would be required to comply with Chapter 20.08 (Pleasanton Building Code) of the Municipal Code, which implements the CBC and requires that foundations and other structural support features would be designed to resist or absorb damaging forces from strong ground shaking, liquefaction, and subsidence. Chapter 17.12 (Geologic Hazards) requires the consideration of geologic hazards when considering applications and permits for new real estate developments or structures for human occupancy. Under Section 17.12.100 (Additional Regulations) of the Municipal Code, the California Department of Housing and Community Development (HCD), with the consent of the City Council, may adopt such standards or regulations as are necessary to protect the public from seismic hazards. Therefore, impacts related to seismic-related ground failure, such as liquefaction, ground settlement, lurching, lateral spreading, and ground cracking would be less than significant.

Conclusion

In conclusion, compliance with local codes, mandatory CBC requirements, and implementation of General Plan policies and programs, would ensure that future development projects are appropriately investigated in terms of potential seismic hazards and that any new buildings and structures are constructed to withstand the anticipated range of seismic events. At the programmatic level, seismic impacts would be reduced to a less than significant level. Consistent with General Plan policies and programs, individual development projects would be required to undergo project-specific environmental review, which may require additional site-specific or project-specific measures to reduce any potential for loss, injury, or death in the event of a seismic event. As such, potential impacts would be less than significant.

Level of Significance

Less than significant impact.

Soil Erosion or Topsoil Loss

Impact GEO-2: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not result in substantial soil erosion or the loss of topsoil.

Development consistent with the Housing Element Update would involve construction activities such as stockpiling, grading, excavation, paving, and other earth-disturbing activities. Loose and disturbed soils are more prone to erosion and loss of topsoil by wind and water. As such, soil erosion is dependent on individual site locations and conditions on-site during construction.

Construction activities that disturb one or more acre of land surface are subject to the NPDES General Permit for Stormwater Discharges Associated with Construction and Land Disturbance Activities (Order No. 2012-0006-DWQ) adopted by the California State Water Resources Control Board (State Water Board). Compliance with the permit requires each qualifying development project to file a Notice of Intent with the State Water Board. Permit conditions require development of a SWPPP, which must describe the site, facility, erosion and sediment controls, runoff water quality monitoring, means of waste disposal, implementation of approved local plans, control of construction sediment and erosion control measures, maintenance responsibilities, and non-stormwater management controls. Inspection of construction sites before and after a storm is also required to identify stormwater discharge from construction activity and to identify and implement erosion controls, where necessary.

The General Plan includes policies and programs that would reduce soil erosion and loss of topsoil. Program 6.2 requires developers to include erosion mitigation and Program 6.3 requires irrigation systems to be developed to minimize the potential for soil saturation and excessive runoff.

The Municipal Code also contains rules and regulations to minimize soil erosion and the loss of topsoil. Chapter 20.08 (Pleasanton Building Code) of the Municipal Code incorporates the most recent CBC, which regulates grading activities, including drainage and erosion control. Section 18.68.110 (Development Plan) requires the use of best engineering practices to avoid erosion and the planting of newly created banks or slopes for erosion control. Section 9.14 (Stormwater Management and Discharge Control) provides requirements with the purpose of protecting and enhancing water quality within the city which includes requirements to reduce soil erosion and loss of topsoil. Section 9.14.080 (Reduction of Pollutants in Stormwater) requires BMPs for all construction sites in the city for erosion control, run-on and runoff control, sediment control, active treatment systems (as appropriate), and good site management through all phases of construction (including, but not limited to, site grading, building, and finishing of lots) until the site is stabilized by landscaping or the installation of permanent erosion control measures.

In addition to compliance with mandatory NPDES permit and Municipal Code requirements, implementation of General Plan policies and programs would further reduce potential soil erosion and loss of topsoil from construction-related soil disturbance. As such, potential impacts related to soil erosion and loss of topsoil would be reduced to less than significant levels.

Level of Significance

Less than significant impact.

Unstable Geologic Location

Impact GEO-3: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse.

As discussed previously in Impacts GEO-1(iii), certain geologic units are present within some of the potential sites for rezoning and have the potential for landslides, slope instability, rock falls, liquefaction, settlement, and liquefaction-induced lateral spreading on-site. Other geologic hazards, such as subsidence or collapse, are also present. As such, development consistent with the Housing Element Update could occur within areas containing unstable geologic units or be located on soils that are unstable or could become unstable from such development.

The General Plan includes policies and programs specifically designed to protect individuals from injuries and minimize property damage resulting from development on unstable geologic units or unstable soils by limiting development in certain areas and requiring increased review and mitigation where appropriate. These policies and programs include, but are not limited to, Goal 2, Policy 5, Programs 5.1, 5.2, 5.3, 5.4, 5.5, Policy 6, Programs 6.1, 6.2, 6.3, 6.4, 6.5, and 6.6, and Policy 7, which would implement standards to assist City decision-makers in the evaluation of development proposals and management of geologic hazard areas.

Site 27 (PUSD-Vineyard) is within the Vineyard Avenue Corridor Specific Plan Area, and it would be required to abide by the applicable geological requirements related to construction as listed above. Compliance with these requirements would minimize structural damage and minimize the exposure of people to risk of injury or death from on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse.

Furthermore, any development consistent with the Housing Element Update would be required to comply with Chapter 20.08 (Pleasanton Building Code) of the Municipal Code, which implements the CBC and requires that foundations and other structural support features would be designed to resist or absorb damaging forces from on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse. Chapter 17.12 (Geologic Hazards) requires the consideration of geologic hazards when considering applications and permits for new real estate developments or structures for human occupancy. Under Section 17.12.100 (Additional Regulations) of the Municipal Code, the HCD, with the consent of the City Council, may adopt such standards or regulations as are necessary to protect the public from seismic hazards.

While analyzing the potential future effects of implementing the Housing Element Update necessarily involves some degree of forecasting, identifying specific examples of what could happen as a result of an individual development proposal is too speculative at this time. Accordingly, future proposed projects located within areas containing unstable geologic units or unstable soils would be

required to conduct an environmental analysis at the time a specific project is defined, including preparation of site-specific soils and geologic reports for review and approval by the City Engineer, and incorporation of the recommended programs during construction.

Therefore, with the implementation of the policies and programs in the General Plan, as well as applicable State and local codes, potential impacts associated with development on unstable geologic units or unstable soils would be less than significant.

Level of Significance

Less than significant impact.

Expansive Soil

Impact GEO-4: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating substantial direct or indirect risks to life or property.

New development constructed on expansive soils could be subject to damage or become unstable when underlying soil shrinks or swells. The actual presence and extent of expansive soils can only be determined as part of site-specific soils and geologic reports.

Furthermore, as discussed previously in Impacts GEO-1(iii), the General Plan includes several policies and programs specifically designed to protect people from injuries and minimize property damage resulting from geologic hazards, such as expansive soils. The General Plan includes policies and programs specifically designed to protect individuals from injuries and minimize property damage resulting from development on expansive soils by limiting development in certain areas and requiring increased review and mitigation where appropriate. These policies and programs include, but are not limited to, Goal 2, Policy 5, Programs 5.1, 5.2, 5.3, 5.4, 5.5, Policy 6, Programs 6.1, 6.2, 6.3, 6.4, 6.5, and 6.6, and Policy 7, which would implement standards to assist City decision-makers in the evaluation of development proposals and management of geologic hazard areas.

Site 27 (PUSD-Vineyard) is within the Vineyard Avenue Corridor Specific Plan Area, and it would be required to abide by the applicable geological requirements related to construction as listed above. Compliance with these requirements would minimize structural damage and minimize the exposure of people to risk of injury or death from expansive soils.

Any development consistent with the Housing Element Update would be required to comply with Chapter 20.08 of the Municipal Code, which implements the CBC. The CBC includes requirements to address soil-related hazards, such as expansive soils. Typical measures to treat hazardous soil conditions involve removal, proper fill selection, and compaction. In cases where soil remediation is not feasible, the CBC requires structural reinforcement of foundations to resist expansive soil forces. Chapter 17.12 (Geologic Hazards) requires the consideration of geologic hazards, such as expansive soil when considering applications and permits for new real estate developments or structures for human occupancy. Under Section 17.12.100 (Additional Regulations) of the Municipal Code, the HCD, with the consent of the City Council, may adopt such standards or regulations as are necessary to protect the public from geologic hazards. Future proposed projects located within areas

susceptible to expansive soils would be required to conduct an environmental analysis at the time a specific project is defined, including preparation of site-specific soils and geologic reports for review and approval by the City Engineer, and incorporation of the recommended programs during construction.

Compliance with the rules and regulations of the Municipal Code, including compliance with the CBC, and implementation of the policies and programs in the General Plan, would ensure that potential impacts related to expansive soils remain less than significant.

Level of Significance

Less than significant impact.

Wastewater Disposal Systems

Impact GEO-5: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not have soils incapable of adequately supporting the use of septic tanks or alternative wastewater disposal systems where sewers are not available for the disposal of wastewater.

Most of the potential sites for rezoning are infill sites; thus, new development consistent with the Housing Element Update would primarily occur on parcels that already contain existing homes or businesses. As such, development consistent with the Housing Element Update would be served by the existing sewer system, and most new development would connect to existing sewer lines.

However, should any new development require the installation of septic tanks or alternative wastewater disposal systems, the General Plan includes policies and programs to ensure that any new development can be feasibly constructed according to soil conditions. Program 5.2 requires a site-specific geologic and/or geotechnical engineering study prior to development for areas with slopes equal to or greater than 20 percent. Program 5.2 requires the mitigation of potential geologic safety hazards during the installation of infrastructure to be incorporated into project design, which would also ensure that the development of septic tanks or alternative wastewater disposal systems can be constructed according to soil conditions. Program 5.5 discourages development, including the development of septic tanks, in areas with high risk of geologic hazards.

Chapter 15 (Sewerage) of the Municipal Code includes provisions to protect the public health and safety by establishing and providing a mechanism for enforcing performance standards for private sewer laterals that connect or are connected to a public sewer main, and to maintain all parts of the sewer system and reduce and prevent sanitary sewer overflows. Section 15.16.020 (Private Disposal of Sewage) requires that a permit be obtained for the installation of individual waste disposal systems, including septic systems, and that all work comply with the provisions of Chapter 15.16.020, including meeting the minimum requirements of the County health department and any applicable provisions of City Council policies.

Implementation of policies and programs in the General Plan, as well as applicable local codes, would ensure that new septic tanks or alternative wastewater disposal systems are constructed on soils that can support such systems. Therefore, impacts would be less than significant.

Level of Significance

Less than significant impact.

Destruction of Paleontological Resource or Unique Geologic Feature

Impact GEO-6: Development consistent with the Housing Element Update, rezonings, and General Plan Specific Plan Amendments could directly or indirectly destroy a unique paleontological resource or site or unique geologic feature.

The city is directly underlain by Quaternary Alluvium, which is unlikely to contain vertebrate fossils. However, it is possible that parts of the city are also underlain by older Quaternary deposits that are known to contain vertebrate fossils. Fossils have been found within five miles of areas in similar deposits. Therefore, the city has moderate paleontological sensitivity. While shallow excavation or grading is unlikely to uncover paleontological resources, deeper excavation into older sediments may uncover significant fossils.²⁸ Therefore, any project involving earthmoving activity could potentially result in inadvertent discovery and disturbance of paleontological resources during grading and excavation work. As such, construction-related and earth-disturbing actions from development consistent with the Housing Element Update on sites underlain by older Quaternary deposits have the potential to damage or destroy fossils resulting in significant impacts on paleontological resources. Though sites underlain by Quaternary Alluvium are unlikely to contain vertebrate fossils, in the unlikely event that any earth-disturbing construction-related activities uncover significant paleontological resources (e.g., bones, teeth, well-preserved plant elements), potential impacts to paleontological resources would be minimized through compliance with federal and State laws that protect paleontological resources. Section 5097 of the Public Resources Code specifies procedures to be followed in the event of unexpected discovery of paleontological resources. Compliance with Section 5097 of the Public Resources Code would minimize the potential to impact paleontological resources directly and indirectly within the potential sites for rezoning that have a low paleontological sensitivity and low paleontological potential.

In addition, Mitigation Measure (MM) GEO-6 requires a site-specific paleontological resources survey to determine potential paleontological impacts for the potential sites for rezoning. Should the site-specific paleontological resources survey identify that a site is underlain by older Quaternary deposits or any other soil with the potential to contain vertebrate fossils, MM GEO-6 requires paleontological monitoring of all proposed excavations. Compliance with Section 5097 and implementation of MM GEO-6 would reduce potential impacts to paleontological resources to less than significant.

Level of Significance Before Mitigation

Potentially significant impact.

²⁸ City of Pleasanton. 2011. Draft Supplemental Environmental Impact Report. City of Pleasanton Housing Element and Climate Action Plan General Plan Amendment and Rezoning. September.

Mitigation Measures

MM GEO-6 A professional paleontologist, approved by the City of Pleasanton, shall conduct a site-specific paleontological resources survey on the potential sites for rezoning.

If any of the potential sites for rezoning are found to be underlain by older Quaternary deposits, or any other soil with the potential to contain vertebrate fossils due to their high paleontological sensitivity for significant resources, applicants, owners and/or sponsors of all future development or construction projects shall be required to perform or provide paleontological monitoring, if recommended by the qualified paleontologist. Should significant paleontological resources (e.g., bones, teeth, well-preserved plant elements) be unearthed by a future project construction crew, project activities shall be diverted at least 15 feet from the discovered paleontological resources until a professional paleontologist has assessed such discovered resources and, if deemed significant, such resources shall be salvaged in a timely manner. The applicant/owner/sponsor of said project shall be responsible for diverting project work and providing the assessment including retaining a professional paleontologist for such purpose. Collected fossils shall be deposited by the applicant/owner/sponsor in an appropriate repository (e.g., University of California Museum of Paleontology (UCMP), California Academy of Sciences) where the collection shall be properly curated and made available for future research.

Level of Significance After Mitigation

Less than significant impact with mitigation incorporated.

3.6.5 - Cumulative Impacts

The geographic context for analysis of cumulative impacts related to geology and soils includes the Tri-Valley Planning Area, which includes the City of Pleasanton as well as the surrounding cities of Dublin, Livermore, and San Ramon and the Town of Danville. The geographic context for paleontological resources includes Alameda County. This analysis evaluates whether the impacts of the Housing Element Update, together with the impacts of cumulative development, would result in a cumulatively significant impact related to geology and soils, including paleontological resources. This analysis then considers whether incremental contribution to cumulative impacts associated with the implementation of the Housing Element Update would be significant. Both conditions must apply for a project's cumulative effects to rise to a level of significance.

Potentially adverse environmental effects associated with seismic hazards, as well as those associated with expansive soils, unstable geologic units, unstable soils, landslides, and erosion, usually are site-specific and generally do not result in cumulative effects.

Cumulative projects would be exposed to similar geologic and seismic hazards during seismic events, but development of individual projects would not increase the potential for impacts to occur. Individual development proposals would be reviewed separately by the appropriate public agency depending on location and undergo environmental review, if appropriate. If future cumulative development would result in impacts related to geologic or seismic impacts, those potential project

or site-specific impacts would be addressed in accordance with the requirements of CEQA. New buildings would be constructed utilizing current design and construction methodologies for earthquake resistant design as required by relevant regulations, including the applicable programs and policies included in the applicable general plans and the applicable municipal codes. Compliance with the CBC, NPDES permits, laws and regulations mentioned above, would ensure that cumulative development would have less than significant impacts associated with geology and soils.

As previously discussed, development facilitated by the Housing Element Update would be required to comply with provisions of the CBC, excavation, and grading requirements of the Pleasanton Municipal Code including policies and programs included in the General Plan, and mandatory NPDES permit requirements to ensure that potential impacts related to site-specific geotechnical conditions remain at less than significant levels. For these reasons, the Housing Element Update's contribution to less than significant cumulative impacts on geology and soils are not cumulatively considerable and the cumulative impact would be less than significant.

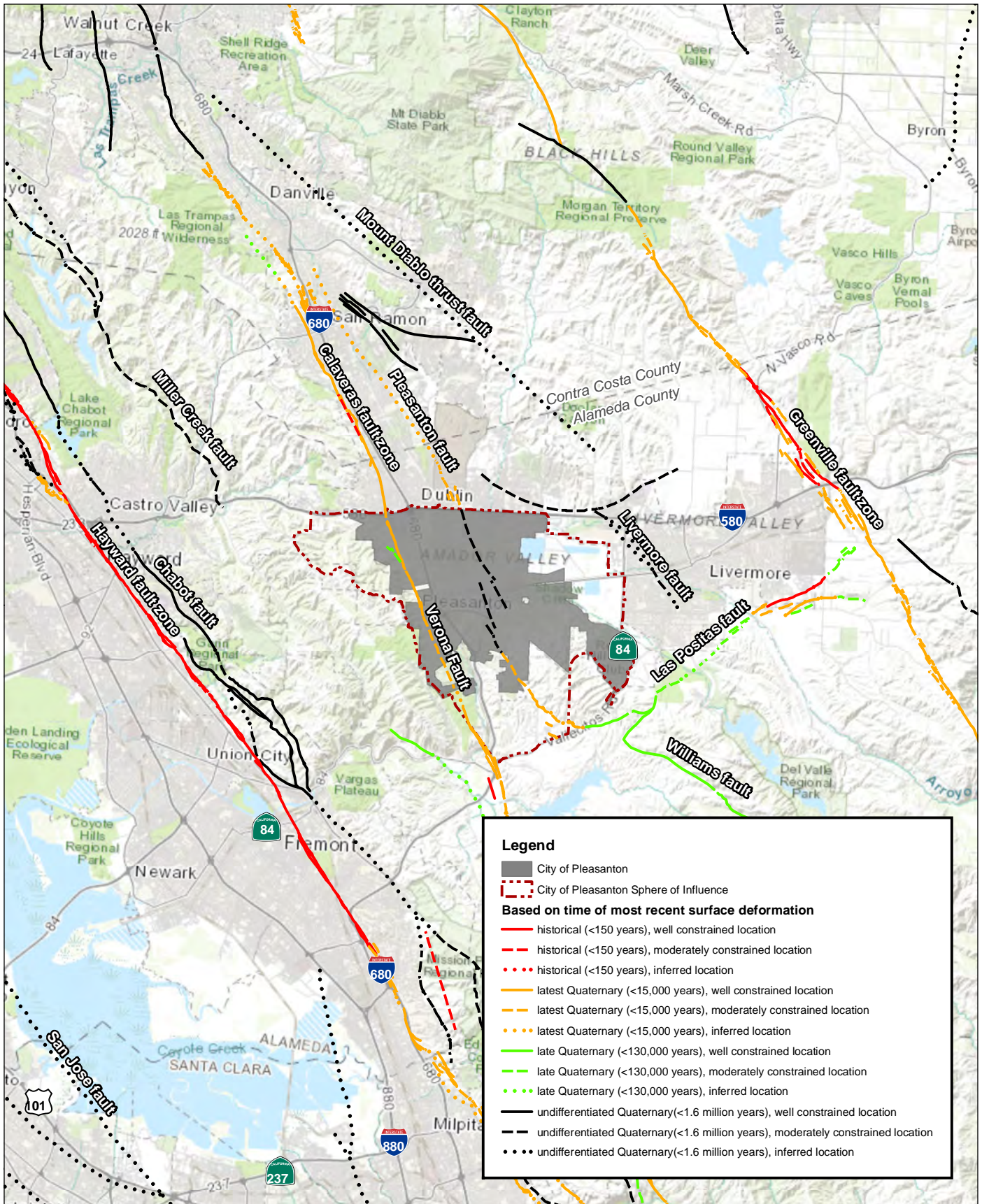
Future development in Alameda County has the potential to cumulatively impact paleontological resources. However, all cumulative projects would be required to comply with federal and State policies related to protection of paleontological resources which reduces potential cumulative impacts to paleontological resources to less than significant. Moreover, the Housing Element Update's incremental contribution to less than significant cumulative impacts would not be significant.

As the City of Pleasanton receives development applications for subsequent development consistent with the Housing Element Update, those applications would be reviewed for compliance with MM GEO-6, which requires a site-specific paleontological resources survey, and, if a site is underlain by older Quaternary deposits or any other soil with the potential to contain vertebrate fossils, would require paleontological monitoring of all proposed excavations. Future development consistent with the Housing Element Update would also be required to conform to federal and State policies that protect paleontological resources, including Section 5097 of the California Public Resources Code. For these reasons, the Housing Element Update's contribution to cumulative impacts on paleontological resources are not cumulatively considerable and would be less than significant.

Level of Cumulative Significance

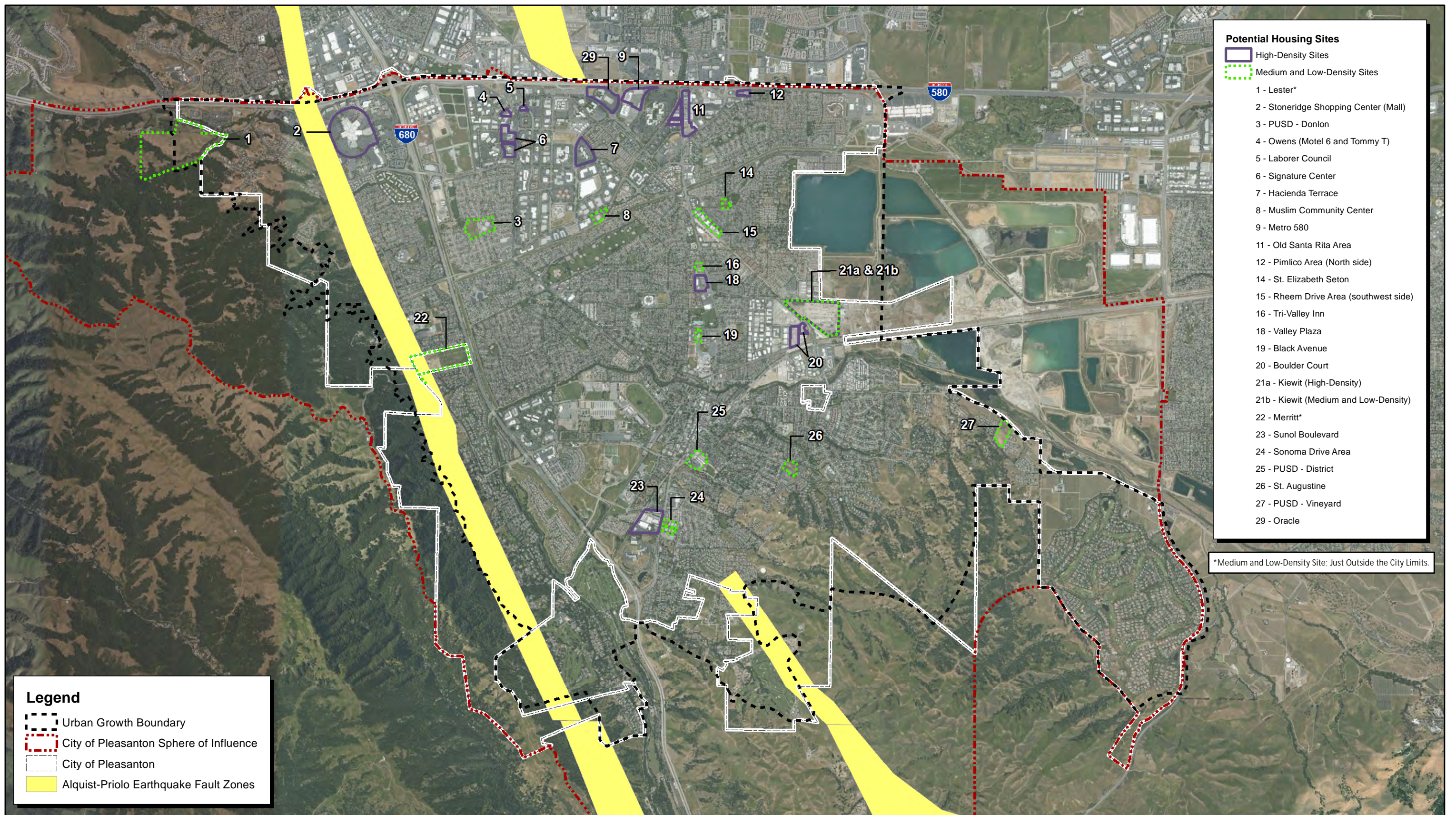
Less than significant impact.

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Source: ESRI World Topographic Map. USGS U.S. Quaternary Faults.

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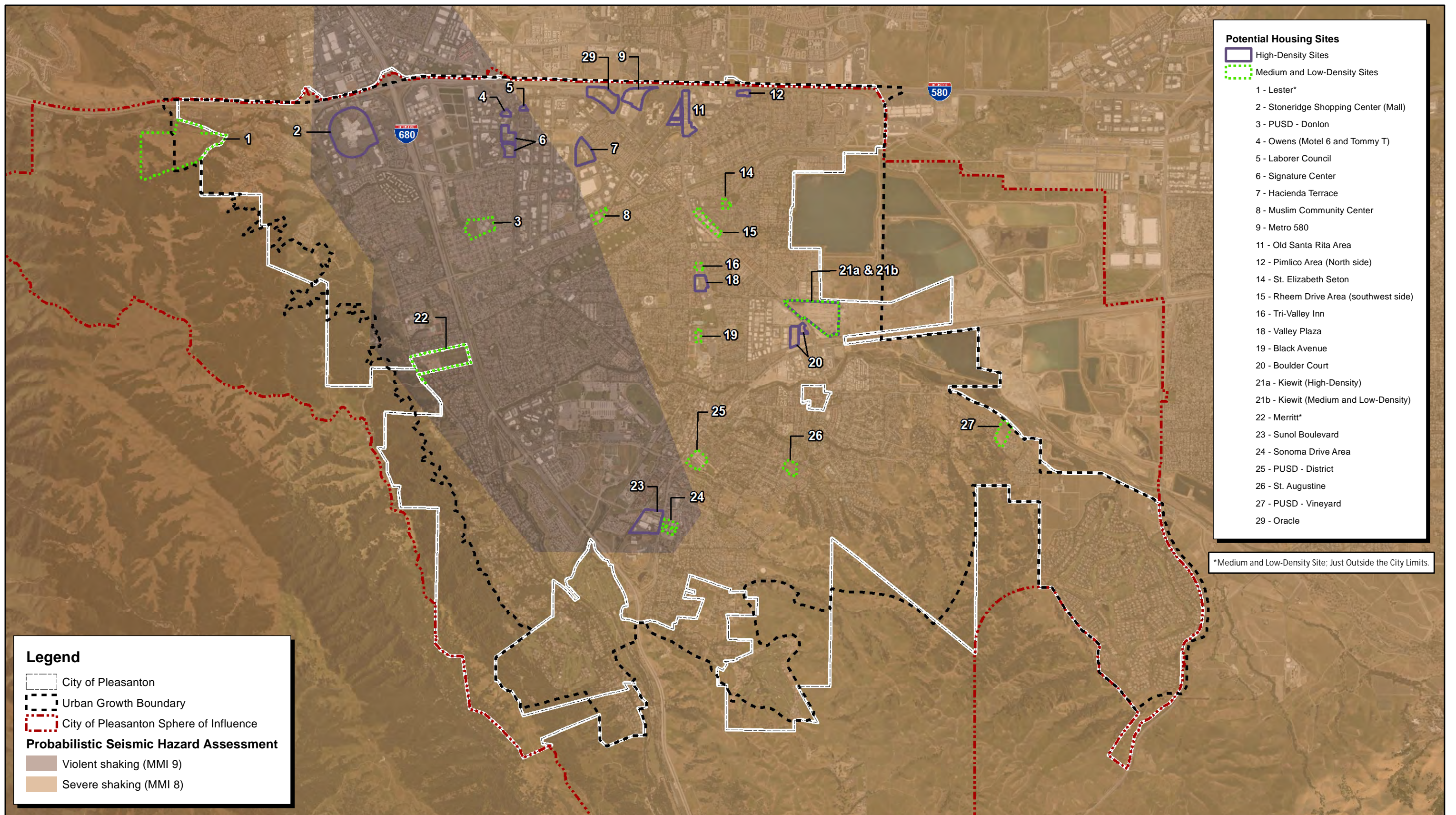


Source: Bing Aerial Imagery, City of Pleasanton, Seismic Hazards Program, California Geological Survey, California Department of Conservation.



Exhibit 3.6-2
Alquist-Priolo Fault Zones

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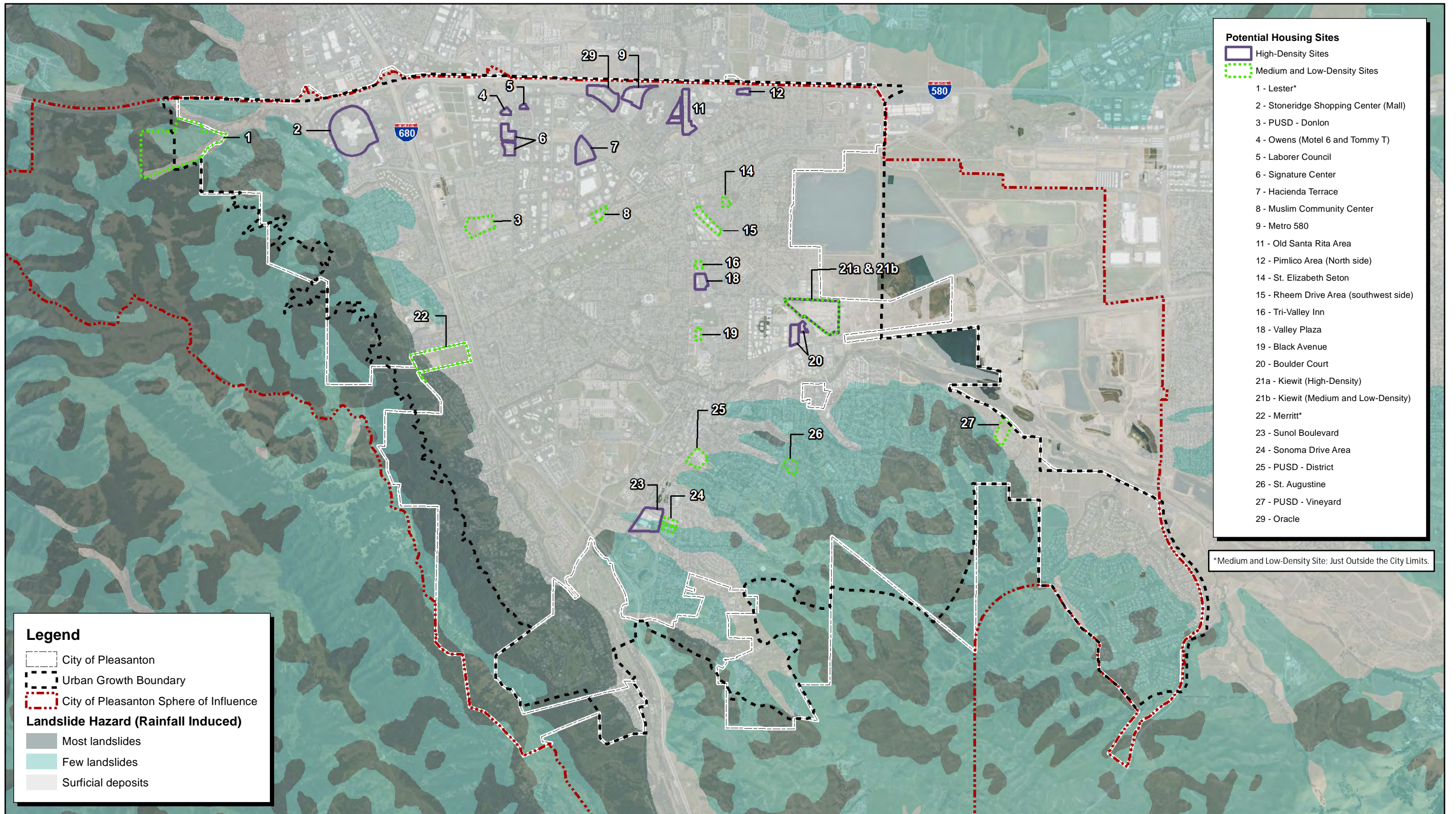


Source: Bing Aerial Imagery, City of Pleasanton, Association of Bay Area Governments (ABAG).



Exhibit 3.6-3
Ground Shaking

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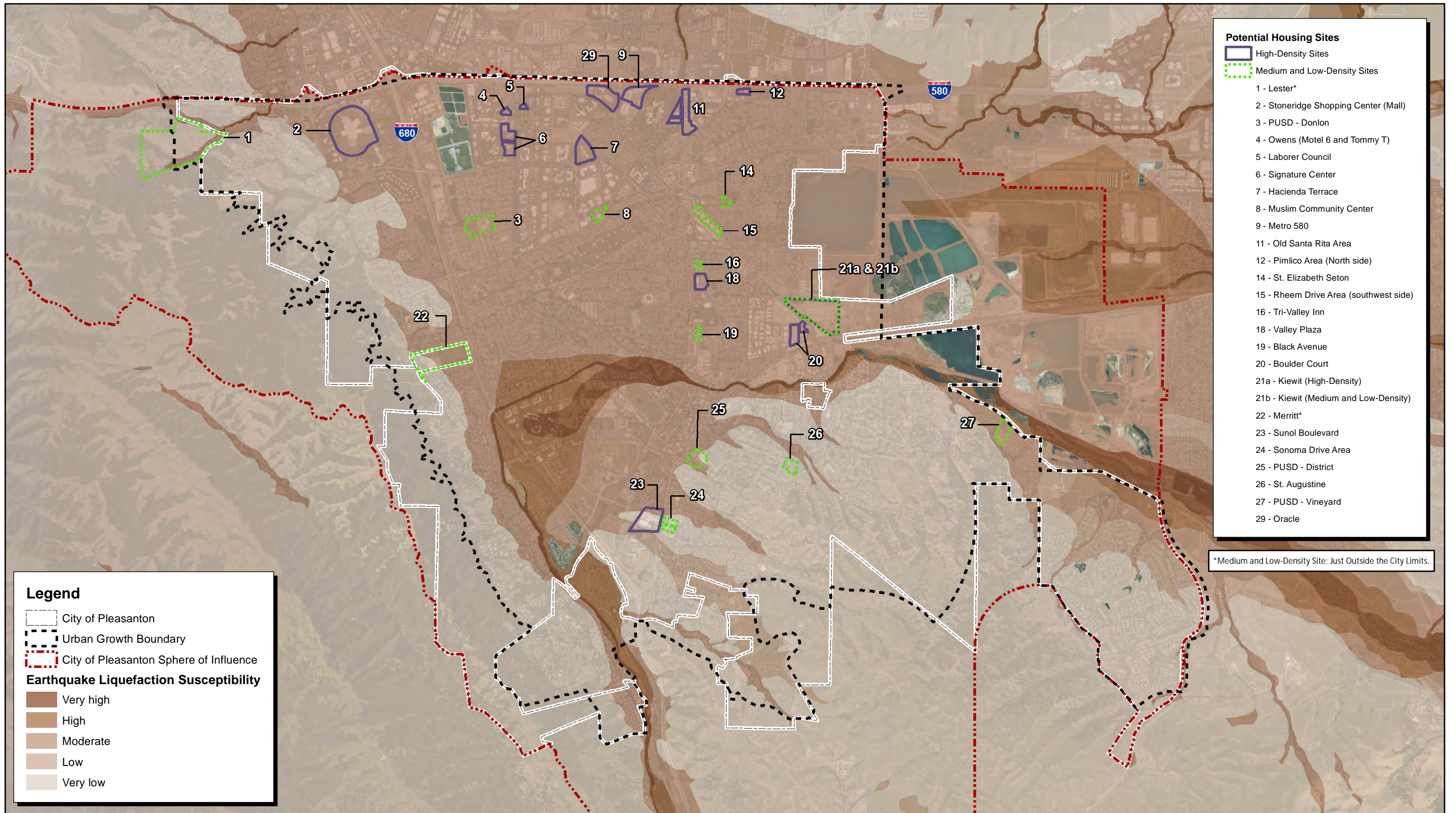


Source: Bing Aerial Imagery. City of Pleasanton. Association of Bay Area Governments (ABAG).



Exhibit 3.6-4
Landslide Potential

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- Potential Housing Sites**
- High-Density Sites
 - Medium and Low-Density Sites
- 1 - Lester*
 - 2 - Stoneridge Shopping Center (Mall)
 - 3 - PUSD - Donlon
 - 4 - Owens (Motel 6 and Tommy T)
 - 5 - Laborer Council
 - 6 - Signature Center
 - 7 - Hacienda Terrace
 - 8 - Muslim Community Center
 - 9 - Metro 580
 - 11 - Old Santa Rita Area
 - 12 - Pimlico Area (North side)
 - 14 - St. Elizabeth Seton
 - 15 - Rheem Drive Area (southwest side)
 - 16 - Tri-Valley Inn
 - 18 - Valley Plaza
 - 19 - Black Avenue
 - 20 - Boulder Court
 - 21a - Kiewit (High-Density)
 - 21b - Kiewit (Medium and Low-Density)
 - 22 - Merritt*
 - 23 - Sunol Boulevard
 - 24 - Sonoma Drive Area
 - 25 - PUSD - District
 - 26 - St. Augustine
 - 27 - PUSD - Vineyard
 - 29 - Oracle

*Medium and Low-Density Site; Just Outside the City Limits.

Legend

- City of Pleasanton
- Urban Growth Boundary
- City of Pleasanton Sphere of Influence

Earthquake Liquefaction Susceptibility

- Very high
- High
- Moderate
- Low
- Very low

Source: Bing Aerial Imagery, City of Pleasanton, Association of Bay Area Governments (ABAG).



Exhibit 3.6-5
Liquefaction Potential

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3.7 - Greenhouse Gas Emissions

3.7.1 - Introduction

This section of the Draft Program Environmental Impact Report (Draft Program EIR) describes the existing greenhouse gas (GHG) emissions setting and addresses potential environmental effects related to GHG emissions from implementation of the proposed 2023-2031 (6th Cycle) Housing Element Update, rezonings, General Plan and Specific Plan Amendments (collectively referred to herein as the Housing Element Update). Future projects consistent with the Housing Element Update will be evaluated for project-specific impacts related to GHG emissions at the time they are proposed. The GHG analysis is included in this Draft Program Environmental Impact Report (Draft Program EIR) as Appendix C.

Once the Housing Element Update is adopted, the General Plan would be amended to include the Housing Element Update. Therefore, all references to the General Plan include the Housing Element Update.

3.7.2 - Environmental Setting

Climate Change

Climate change is a change in the average weather of the Earth that is measured by alterations in wind patterns, storms, precipitation, and temperature. These changes are assessed using historical records of temperature changes occurring in the past, such as during previous ice ages. Many of the concerns regarding climate change use this data to extrapolate a level of statistical significance specifically focusing on temperature records from the last 150 years (the Industrial Age) that differ from previous climate changes in rate and magnitude.

The United Nations Intergovernmental Panel on Climate Change (IPCC) constructed several emission trajectories of GHGs needed to stabilize global temperatures and climate change impacts. In its Sixth Assessment Report, the IPCC predicted that the global mean temperature change from 2015 to 2100, given five scenarios, could range from 1.4°C (degrees Celsius) to 4.4°C. Regardless of analytical methodology, global average temperatures and sea levels are expected to rise under all scenarios.¹ The report also concluded that “[i]t is unequivocal that human influence has warmed the atmosphere, ocean and land. Widespread and rapid changes in the atmosphere, ocean, cryosphere and biosphere have occurred.” Warming of the climate system is now considered unequivocal,² with the likely range of total human-caused global surface temperature increases from approximately 0.8°C to 1.3°C since 1850.³

An individual project cannot generate enough GHG emissions to effect a discernible change in global climate. However, the development consistent with the Housing Element Update would play a part in the potential for global climate change by its incremental contribution of GHGs combined with the cumulative increase of all other sources of GHGs, which when taken together constitute potential influences on global climate change.

¹ Intergovernmental Panel on Climate Change (IPCC). 2021. Climate Change 2021: The Physical Science Basis Summary for Policymakers.

² Ibid.

³ Ibid.

Greenhouse Gases

The GHGs defined by Assembly Bill (AB) 32 in 2006 include carbon dioxide (CO₂), methane (CH₄), nitrous oxide (N₂O), hydrofluorocarbons, perfluorocarbons, and sulfur hexafluoride. A seventh GHG, nitrogen trifluoride (NF₃), was added to California Health and Safety Code Section 38505(g)(7) as a GHG of concern.

For the purposes of this analysis, emissions of CO₂, CH₄, and N₂O were evaluated because these gases are the primary contributors to global climate change from development projects. Although other substances such as fluorinated gases also contribute to global climate change, sources of fluorinated gases are not well-defined, and no accepted emissions factors or methodology exist to accurately calculate these gases.

As shown in Table 3.7-1, individual GHG compounds have varying global warming potential and atmospheric lifetimes. The global warming potential is the potential of a gas or aerosol to trap heat in the atmosphere. To describe how much global warming a given type and amount of GHG may cause, the CO₂ equivalent (CO₂e) is used. The calculation of the CO₂ equivalent is a consistent methodology for comparing GHG emissions since it normalizes various GHG emissions to a consistent reference gas, CO₂. For example, CH₄'s warming potential of 25 indicates that CH₄ has 25 times greater warming effect than CO₂ on a molecule-per-molecule basis. A CO₂ equivalent is the mass emissions of an individual GHG multiplied by its global warming potential.

Table 3.7-1: Global Warming Potentials and Atmospheric Lifetime of Select GHGs

Category	Atmospheric Lifetime (years)	Global Warming Potential (100-year time horizon)
Carbon Dioxide (CO ₂)	50 to 200	1
Methane (CH ₄)	12±3	25
Nitrous Oxide	120	298
HFC-23	264	11,700
HFC-134a	14.6	1,300
HFC-152a	1.5	140
PFC: Tetrafluoromethane	50,000	6,500
PFC: Hexafluoroethane (C ₂ F ₆)	10,000	9,200
Sulfur Hexafluoride (SF ₆)	3,200	23,900

Sources:

Intergovernmental Panel on Climate Change (IPCC). 2007. Climate Change 2007: The Physical Science Basis. Contribution of Working Group I to the Fourth Assessment Report of the Intergovernmental Panel on Climate Change (Solomon, S., D. Qin, M. Manning, Z. Chen, M. Marquis, K.B. Averyt, M. Tignor and H.L. Miller [eds.]). Cambridge University Press, Cambridge, United Kingdom and New York, NY, USA.

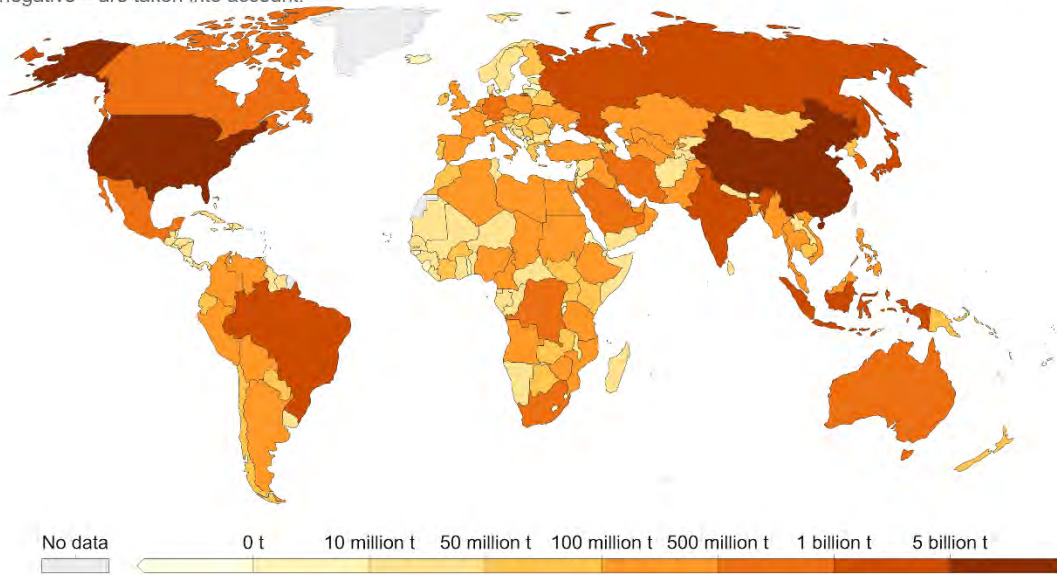
Intergovernmental Panel on Climate Change (IPCC). 2014. Climate Change 2007: Synthesis Report. Contribution of Working Groups I, II and III to the Fifth Assessment Report of the Intergovernmental Panel on Climate Change (Core Writing Team, Pachauri, R.K. and Reisinger, A. [eds.]). IPCC, Geneva, Switzerland.

Emissions Inventories

An emissions inventory is a database that lists, by source, the amount of air pollutants discharged into the atmosphere of a geographic area during a given time period. Emissions worldwide were approximately 49.76 billion metric tons (MT) of CO₂e in 2019. Figure 3.7-1 shows the total GHG emissions by countries, where China was the largest GHG emitter with 12.06 billion MT CO₂e, and the United States was the second largest GHG emitter with approximately 6 billion MT CO₂e.⁴

Total greenhouse gas emissions, 2019

Emissions are measured in carbon dioxide equivalents (CO₂eq). This means non-CO₂ gases are weighted by the amount of warming they cause over a 100-year timescale. Emissions from land use change – which can be positive or negative – are taken into account.



Source: Our World in Data based on Climate Analysis Indicators Tool (CAIT).
Note: Greenhouse gases are weighted by their global warming potential value (GWP100). GWP100 measures the relative warming impact of one molecule of a greenhouse gas, relative to carbon dioxide, over 100 years.
OurWorldInData.org/co2-and-other-greenhouse-gas-emissions • CC BY

Source: Hannah Ritchie, Max Roser and Pablo Rosado on OurWorldInData.org. 2020. Greenhouse Gases Emissions. Website: <https://ourworldindata.org/greenhouse-gas-emissions>. Accessed September 2, 2022.

Figure 3.7-1: Greenhouse Gas Emissions by Countries

United States GHG Inventory

In 2019, United States GHG emissions totaled 6,558 million metric tons (MMT) CO₂e. In 2020, U.S. GHG emissions totaled 5,222 MMT CO₂e after accounting for sequestration from the land sector. Emissions decreased from 2019 to 2020 by 11 percent (after accounting for sequestration from the land sector). The primary driver for the decrease was an 11 percent decrease in CO₂ emissions from fossil fuel combustion. This decrease was primarily due to a 13 percent decrease in transportation emissions driven by decreased demand due to the ongoing COVID-19 pandemic. Figure 3.7-2

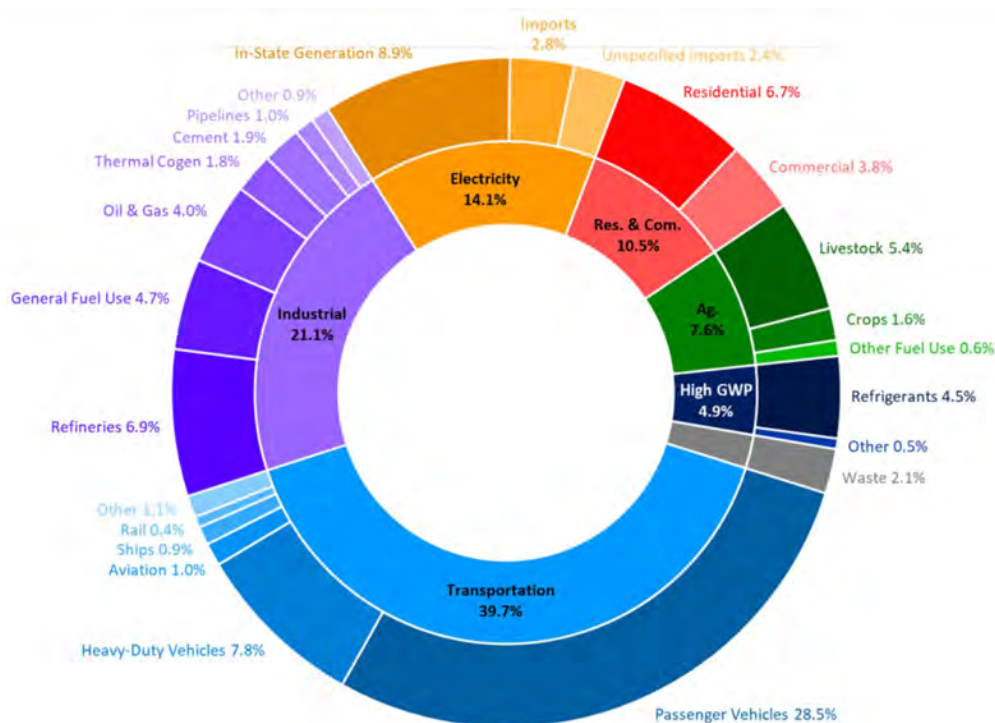
⁴ Hannah Ritchie, Max Roser, and Pablo Rosado on OurWorldInData.org. 2020. Greenhouse Gases Emissions. Website: <https://ourworldindata.org/greenhouse-gas-emissions>. Accessed September 2, 2022.

presents 2020 United States GHG emissions by economic sector. GHG emissions in 2020 were 21 percent below 2005 levels.⁵

California GHG Inventory

As the second largest emitter of GHG emissions in the United States, California contributes 418.1 MMT CO₂e in 2019 of GHG emissions to the atmosphere.⁶ Anthropogenic CO₂ are largely byproducts of fossil fuel combustion and are attributable to transportation, industry/manufacturing, electricity generation, natural gas consumption, and agriculture processes.

As shown in Figure 3.7-2, in California, the transportation sector is the largest emitter at approximately 40 percent of GHG emissions, followed by industrial at approximately 21 percent of GHG emissions.⁷



Source: California Air Resources Board (ARB). 2021. California GHG Inventory. Website: https://ww3.arb.ca.gov/cc/inventory/pubs/reports/2000_2019/ghg_inventory_trends_00-19.pdf. Accessed July 29, 2022.

Figure 3.7-2: California Greenhouse Gas Emissions by Sector in 2019

Pleasanton GHG Inventory

The City completed its first GHG emissions inventory in 2007 and its first CAP 1.0 in 2012. Recently, the City adopted CAP 2.0 in March 2022. Based on the City's GHG emissions inventories, between 1990 and 2017, GHG emissions have declined 15 percent, from 691,161 to 588,553 MT CO₂e. Even as

⁵ United States Environmental Protection Agency (EPA). 2022. Inventory of U.S. Greenhouse Gas Emissions and Sinks. Website: <https://www.epa.gov/ghgemissions/inventory-us-greenhouse-gas-emissions-and-sinks>. Accessed June 18, 2022.

⁶ California Air Resources Board (ARB). 2021. Current California GHG Emission Inventory Data. Website: <https://ww2.arb.ca.gov/ghg-inventory-data>. Accessed July 29, 2022.

⁷ California Air Resources Board (ARB). 2021. California Greenhouse Gas Emissions for 2000 to 2019, Trends of Emissions and Other Indicators. July 28.

the city has continued to experience a growing population and economy, the community achieved a per capita emissions reduction from 13.7 to 7.67 MT CO₂e. Figure 3.7-3 shows the communitywide emissions changes from 1990 to 2017 by sector.⁸

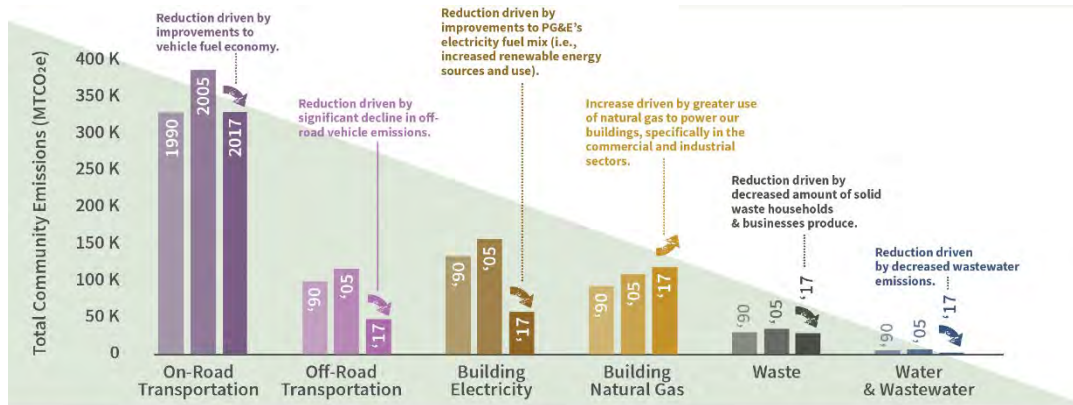


Figure 3.7-3: Communitywide emissions changes from 1990 to 2017, by sector

The CAP 2.0 includes a linear emissions reduction target pathway that complies with the latest State-level policies and supports a qualified CAP through 2030. This pathway includes GHG emission reduction targets to reduce emissions to 4.1 MT CO₂e per capita by 2030 and work towards carbon neutrality by 2045.

Environmental Effects of Climate Change in California

The California Environmental Protection Agency (Cal/EPA) published a report titled “Scenarios of Climate Change in California: An Overview” (Climate Scenarios report) in February 2006, that while not adequate for a California Environmental Quality Act (CEQA) project-specific or cumulative analysis, is generally instructive about the Statewide impacts of global warming.

The Climate Scenarios report uses a range of emissions scenarios developed by the IPCC to project a series of potential warming ranges (i.e., temperature increases) that may occur in California during the 21st century: lower warming range (3.0–5.5°F [degrees Fahrenheit]); medium warming range (5.5–8.0°F); and higher warming range (8.0–10.5°F). The Climate Scenarios report then presents an analysis of future climate in California under each warming range, that while uncertain, present a picture of the impacts of global climate change trends in California.

In addition, on August 5, 2009, the State’s Natural Resources Agency released a public review draft of its “California Climate Adaptation Strategy” report that details many vulnerabilities arising from climate change with respect to matters such as temperature extremes, sea level rise, wildfires, floods and droughts and precipitation changes. The California Climate Adaptation Strategy responds to former Governor Schwarzenegger’s Executive Order S-13-2008 that called on State agencies to develop California’s strategy to identify and prepare for expected climate impacts.

⁸ City of Pleasanton. 2022. Climate Action Plan 2.0. March.

According to the Climate Scenarios report and the California Climate Adaptation Strategy, substantial temperature increases arising from increased GHG emissions potentially could result in a variety of impacts to the people, economy, and environment of California associated with a projected increase in extreme conditions, with the severity of the impacts depending upon actual future emissions of GHGs and associated warming.

In California, climate change may result in consequences such as the following:^{9,10}

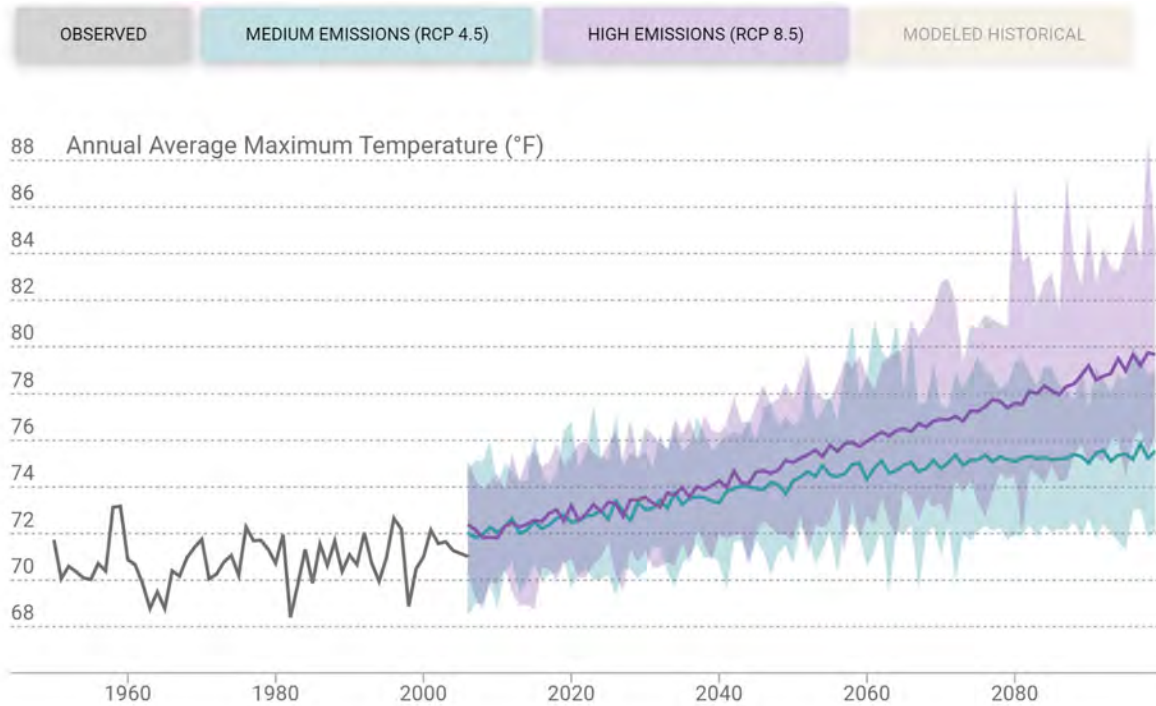
- **A reduction in the quality and supply of water from the Sierra snowpack.** If heat-trapping emissions continue unabated, more precipitation will fall as rain instead of snow, and the snow that does fall will melt earlier, reducing the Sierra Nevada spring snowpack by as much as 70 to 90 percent. This can lead to challenges in securing adequate water supplies. It can also lead to a potential reduction in hydropower.
- **Increased risk of large wildfires.** If rain increases as temperatures rise, wildfires in the grasslands and chaparral ecosystems of Southern California are estimated to increase by approximately 30 percent toward the end of the 21st century because more winter rain will stimulate the growth of more plant “fuel” available to burn in the fall. In contrast, a hotter, drier climate could promote up to 90 percent more Northern California fires by the end of the century by drying out and increasing the flammability of forest vegetation.
- **Reductions in the quality and quantity of certain agricultural products.** The crops and products likely to be adversely affected include wine grapes, fruit, nuts, and milk.
- **Exacerbation of air quality problems.** If temperatures rise to the medium warming range, there could be 75 to 85 percent more days with weather conducive to ozone formation in Los Angeles and the San Joaquin Valley, relative to today’s conditions. This is more than twice the increase expected if rising temperatures remain in the lower warming range. This increase in air quality problems could result in an increase in asthma and other health-related problems.
- **A rise in sea levels resulting in the displacement of coastal businesses and residences.** During the past century, sea levels along California’s coast have risen about 7 inches. If emissions continue unabated and temperatures rise into the higher anticipated warming range, sea level is expected to rise an additional 22 to 35 inches by the end of the century. Elevations of this magnitude would inundate coastal areas with salt water, accelerate coastal erosion, threaten vital levees and inland water systems, and disrupt wetlands and natural habitats.
- **An increase temperature and extreme weather events.** Climate change is expected to lead to increases in the frequency, intensity, and duration of extreme heat events and heat waves in California. More heat waves can exacerbate chronic disease or heat-related illness.
- **A decrease in the health and productivity of California’s forests.** Climate change can cause an increase in wildfires, an enhanced insect population, and establishment of non-native species.

⁹ California Climate Change Center. 2006. Scenarios of Climate Change in California: An Overview. February.

¹⁰ Moser, Susie, Guido Franco, Sarah Pittiglio, Wendy Chou, Dan Cayan. 2009. The Future Is Now: An Update on Climate Change Science Impacts and Response Options for California. California Energy Commission, PIER Energy-Related Environmental Research Program. CEC-500-2008-071. Website: <https://lynceans.org/wp-content/uploads/2020/01/Moser-2009-Climate-change-impacts-across-CA-.pdf>. Accessed July 29, 2022.

Consequences of Climate Change in the City of Pleasanton

Figure 3.7-4 displays a chart of measured historical and projected annual average temperatures in the City of Pleasanton (City). As shown in the figure, temperatures are expected to rise in the low and high GHG emissions scenarios. The results indicate that, by midcentury (2035-2064), the annual average maximum temperature is predicted to increase by 3.5 °F under the medium emission scenario and 4.7 °F under the high emissions scenario.¹¹



Source: Cal-adapt. Climate Tools. Website: <https://cal-adapt.org/tools/local-climate-change-snapshot>. Accessed July 29, 2022. (Average of all the hottest daily temperatures in a year)

Figure 3.7-4: Annual Average Maximum Temperatures in City of Pleasanton

3.7.3 - Regulatory Framework

International

International organizations such as the ones discussed below have made substantial efforts to reduce GHGs. Preventing human-induced climate change will require the participation of all nations in solutions to address the issue.

Kyoto Protocol

In 1988, the United Nations established the IPCC to evaluate the impacts of global warming and to develop strategies that nations could implement to curtail global climate change. In 1992, the United States joined other countries around the world in signing the United Nations Framework Convention on Climate Change (UNFCCC) agreement with the goal of controlling GHG emissions. As a result, the

¹¹ Cal-adapt. 2022. Climate Tools. Website: <https://cal-adapt.org/tools/local-climate-change-snapshot>. Accessed July 29, 2022.

Climate Change Action Plan was developed to address the reduction of GHGs in the United States. The Climate Change Action Plan currently consists of more than 50 voluntary programs for member nations to adopt.

The Kyoto Protocol is a treaty made under the UNFCCC and was the first international agreement to regulate GHG emissions. Some have estimated that if the commitments outlined in the Kyoto Protocol are met, global GHG emissions could be reduced an estimated 5 percent from 1990 levels during the first commitment period of 2008-2012. Notably, while the United States is a signatory to the Kyoto Protocol, Congress has not ratified the Protocol and the United States is not bound by the Protocol's commitments. In December 2009, international leaders from 192 nations met in Copenhagen to address the future of international climate change commitments post-Kyoto.

Paris Climate Change Agreement

Parties to the UNFCCC reached a landmark agreement on December 12 in Paris, charting a fundamentally new course in the two-decade-old global climate effort. Culminating a 4-year negotiating round, the new treaty ends the strict differentiation between developed and developing countries that characterized earlier efforts, replacing it with a common framework that commits all countries to put forward their best efforts and to strengthen them in the years ahead. This includes, for the first time, requirements that all parties report regularly on their emissions and implementation efforts and undergo international review.

The agreement and a companion decision by parties were the key outcomes of the conference, known as the 21st session of the UNFCCC Conference of the Parties, or "COP 21." Together, the Paris Agreement and the accompanying COP decision:

- Reaffirm the goal of limiting global temperature increase well below 2 degrees Celsius, while urging efforts to limit the increase to 1.5 degrees.
- Establish binding commitments by all parties to make "nationally determined contributions" (NDCs), and to pursue domestic measures aimed at achieving them.
- Commit all countries to report regularly on their emissions and "progress made in implementing and achieving" their NDCs, and to undergo international review.
- Commit all countries to submit new NDCs every 5 years, with the clear expectation that they will "represent a progression" beyond previous ones.
- Reaffirm the binding obligations of developed countries under the UNFCCC to support the efforts of developing countries, while for the first time encouraging voluntary contributions by developing countries too.
- Extend the current goal of mobilizing \$100 billion a year in support by 2020 through 2025, with a new, higher goal to be set for the period after 2025.
- Extend a mechanism to address "loss and damage" resulting from climate change, which explicitly will not "involve or provide a basis for any liability or compensation."
- Require parties engaging in international emissions trading to avoid "double counting."

- Call for a new mechanism, similar to the Clean Development Mechanism under the Kyoto Protocol, enabling emission reductions in one country to be counted toward another country's NDC.¹²

On June 1, 2017, former President Trump announced the decision for the United States to withdraw from the Paris Agreement.¹³ However, on January 20, 2021, President Biden signed the instrument to bring the United States back into the Paris Agreement that same day.¹⁴ Nonetheless, California remains committed to addressing climate change through programs aimed to reduce GHGs.¹⁵

Federal

Prior to the last decade, there were no concrete federal regulations of GHGs or major planning for climate change adaptation. Since then, federal activity has increased. The following are actions regarding the federal government, GHGs, and fuel efficiency.

Clean Air Act

Massachusetts et al. v. Environmental Protection Agency (EPA) (Supreme Court Case 05-1120) (2007) 549 U.S. 497 was argued before the United States Supreme Court on November 29, 2006, in which it was petitioned that the United States EPA regulate four GHGs, including CO₂, under Section 202(a)(1) of the Clean Air Act (CAA). A decision was made on April 2, 2007, in which the Supreme Court found that GHGs are air pollutants covered by the CAA. The Court held that the Administrator must determine whether emissions of GHGs from new motor vehicles cause or contribute to air pollution, which may reasonably be anticipated to endanger public health or welfare, or whether the science is too uncertain to make a reasoned decision. On December 7, 2009, the EPA Administrator signed two distinct findings regarding GHGs under Section 202(a) of the CAA:

- **Endangerment Finding:** The Administrator finds that the current and projected concentrations of the six key well-mixed GHGs—CO₂, CH₄, N₂O, HFCs, PFCs, and SF₆—in the atmosphere threaten the public health and welfare of current and future generations; and
- **Cause or Contribute Finding:** The Administrator finds that the combined emissions of these well-mixed GHG emissions from new motor vehicles and new motor vehicle engines contribute to the GHG pollution, which threatens public health and welfare.

These findings do not impose requirements on industry or other entities. However, this was a prerequisite for implementing GHG emissions standards for vehicles, as discussed under “Clean Vehicles” below. After a lengthy legal challenge, the U.S. Supreme Court declined to review an Appeals Court ruling which upheld the EPA Administrator findings.

¹² Center for Climate and Energy Solutions (C²ES). 2015. Outcomes of the U.N. Climate Change Conference in Paris. December.

¹³ The White House. 2017. Statement by former President Trump on the Paris Climate Accord. Website: <https://it.usembassy.gov/statement-president-trump-paris-climate-accord/>. Accessed July 29, 2022.

¹⁴ The White House. 2021. Statement by President Biden: Paris Climate Agreement. Website: <https://www.whitehouse.gov/briefing-room/statements-releases/2021/01/20/paris-climate-agreement/>. Accessed July 29, 2022.

¹⁵ California Air Resources Board (ARB). 2017. New Release: California and China Team Up to Push for Millions More Zero-emission Vehicles. Website: <https://ww2.arb.ca.gov/news/california-and-china-team-push-millions-more-zero-emission-vehicles>. Accessed July 29, 2022.

United States Consolidated Appropriations Act (Mandatory Greenhouse Gas Reporting)

The Consolidated Appropriations Act of 2008, passed in December 2007, requires the establishment of mandatory GHG reporting requirements. On September 22, 2009, the EPA issued the Final Mandatory Reporting of Greenhouse Gases Rule, which became effective January 1, 2010. The rule requires reporting of GHG emissions from large sources and suppliers in the United States and is intended to collect accurate and timely emissions data to inform future policy decisions. Under the rule, suppliers of fossil fuels or industrial GHGs, manufacturers of vehicles and engines, and facilities that emit 25,000 MT or more per year of GHG emissions are required to submit annual reports to the EPA. The first annual reports for the largest emitting facilities, covering calendar year 2010, were submitted to EPA in 2011.

U.S. Clean Air Act Permitting Programs (New Greenhouse Gas Source Review)

The EPA issued a final rule on May 13, 2010, which establishes thresholds for GHGs that define when permits under the New Source Review Prevention of Significant Deterioration and Title V Operating Permit programs are required for new and existing industrial facilities. This final rule “tailors” the requirements of these CAA permitting programs to limit which facilities will be required to obtain Prevention of Significant Deterioration and Title V permits. In the preamble to the revisions to the Code of Federal Regulations, the EPA states:

This rulemaking is necessary because without it the Prevention of Significant Deterioration and Title V requirements would apply, as of January 2, 2011, at the 100 or 250 tons per year levels provided under the Clean Air Act, greatly increasing the number of required permits, imposing undue costs on small sources, overwhelming the resources of permitting authorities, and severely impairing the functioning of the programs. EPA is relieving these resource burdens by phasing in the applicability of these programs to greenhouse gas sources, starting with the largest greenhouse gas emitters. This rule establishes two initial steps of the phase-in. The rule also commits the agency to take certain actions on future steps addressing smaller sources but excludes certain smaller sources from Prevention of Significant Deterioration and Title V permitting for greenhouse gas emissions until at least April 30, 2016.

The EPA estimates that facilities responsible for nearly 70 percent of the national GHG emissions from stationary sources will be subject to permitting requirements under this rule. This includes the nation’s largest GHG emitters—power plants, refineries, and cement production facilities.

Energy Independence and Security Act

The Energy Policy Act of 2005 created the Renewable Fuel Standard program. The Energy Independence and Security Act of 2007 expanded this program by:

- Expanding the Renewable Fuel Standard program to include diesel in addition to gasoline.
- Increasing the volume of renewable fuel required to be blended into transportation fuel from 9 billion gallons in 2008 to 36 billion gallons by 2022.
- Establishing new categories of renewable fuel and setting separate volume requirements for each one.

- Requiring EPA to apply lifecycle GHG performance threshold standards to ensure that each category of renewable fuel emits fewer GHGs than the petroleum fuel it replaces.

This expanded Renewable Fuel Standard program lays the foundation for achieving substantial reductions of GHG emissions from the use of renewable fuels, reducing the use of imported petroleum, and encouraging the development and expansion of the nation's renewable fuels sector.

Signed on December 19, 2007, by former President George W. Bush, the Energy Independence and Security Act of 2007 (EISA) aims to:

- Move the United States toward greater energy independence and security.
- Increase the production of clean renewable fuels.
- Protect consumers.
- Increase the efficiency of products, buildings, and vehicles.
- Promote research on and deploy GHG emission capture and storage options.
- Improve the energy performance of the federal government.
- Increase U.S. energy security, develop renewable fuel production, and improve vehicle fuel economy.

EISA reinforces the energy reduction goals for federal agencies put forth in Executive Order 13423, as well as introduces more aggressive requirements. The three key provisions enacted are the Corporate Average Fuel Economy Standards, the Renewable Fuel Standard, and the appliance/lighting efficiency standards.

The EPA is committed to developing, implementing, and revising both regulations and voluntary programs under the following subtitles in EISA, among others:

- Increased Corporate Average Fuel Economy Standards
- Federal Vehicle Fleets
- Renewable Fuel Standard
- Biofuels Infrastructure
- Carbon Capture and Sequestration¹⁶

EPA and National Highway Traffic Safety Administration Light-Duty Vehicle Greenhouse Gas Emission Standards and Corporate Average Fuel Economy Standards Final Rule

Congress first passed the Corporate Average Fuel Economy law in 1975 to increase the fuel economy of cars and light-duty trucks. The law has become more stringent over time. On May 19, 2009, former President Obama put in motion a new national policy to increase fuel economy for all new cars and trucks sold in the United States. On April 1, 2010, the EPA and the Department of Transportation's National Highway Traffic Safety Administration (NHTSA) announced a joint final rule

¹⁶ United States Environment Protection Agency (EPA). 2022. Summary of the Energy Independence and Security Act. Website: <https://www.epa.gov/laws-regulations/summary-energy-independence-and-security-act>. Accessed July 29, 2022.

establishing a national program that would reduce GHG emissions and improve fuel economy for new cars and trucks sold in the United States.

The first phase of the national program would apply to passenger cars, light-duty trucks, and medium-duty passenger vehicles, covering model years 2012 through 2016. They require these vehicles to meet an estimated combined average emissions level of 250 grams of CO₂ per mile, equivalent to 35.5 miles per gallon if the automobile industry were to meet this CO₂ level solely through fuel economy improvements. Together, these standards would cut CO₂ emissions by an estimated 960 MMT and 1.8 billion barrels of oil over the lifetime of the vehicles sold under the program (model years 2012-2016).

The EPA and the NHTSA issued final rules on a second phase joint rulemaking, establishing national standards for light-duty vehicles for model years 2017 through 2025 in August 2012.¹⁷ The new standards for model years 2017 through 2025 apply to passenger cars, light-duty trucks, and medium-duty passenger vehicles. The final standards are projected to result in an average industry fleet wide level of 163 grams/mile of CO₂ in model year 2025, which is equivalent to 54.5 miles per gallon if achieved exclusively through fuel economy improvements.

The EPA and NHTSA issued final rules for the first national standards to reduce GHG emissions and improve fuel efficiency of heavy-duty trucks and buses on September 15, 2011, which became effective November 14, 2011. For combination tractors, the agencies are proposing engine and vehicle standards that began in the 2014 model year and achieve up to a 20 percent reduction in CO₂ emissions and fuel consumption by the 2018 model year. For heavy-duty pickup trucks and vans, the agencies are proposing separate gasoline and diesel truck standards, which phase in starting in the 2014 model year and achieve up to a 10 percent reduction for gasoline vehicles, and a 15 percent reduction for diesel vehicles by 2018 model year (12 and 17 percent respectively if accounting for air conditioning leakage). Lastly, for vocational vehicles, the engine and vehicle standards would achieve up to a 10 percent reduction in fuel consumption and CO₂ emissions from the 2014 to 2018 model years.

The State of California has received a waiver from the EPA to have separate, stricter Corporate Average Fuel Economy Standards. Although global climate change did not become an international concern until the 1980s, efforts to reduce energy consumption began in California in response to the oil crisis in the 1970s, resulting in the incidental reduction of GHG emissions. To manage the State's energy needs and promote energy efficiency, AB 1575 created the California Energy Commission (CEC) in 1975.

State

California Assembly Bill 32: Global Warming Solutions Act and Scoping Plan

The California State Legislature enacted AB 32, the California Global Warming Solutions Act of 2006. AB 32 requires that GHGs emitted in California be reduced to 1990 levels by the year 2020.

¹⁷ United States Environmental Protection Agency (EPA). 2012. EPA and NHTSA Set Standards to Reduce Greenhouse Gases and Improve Fuel Economy for Model Years 2017-2025 Cars and Light Trucks. Website: <https://www.nhtsa.gov/document/fact-sheet-epa-and-nhtsa-propose-standards-reduce-greenhouse-gas-emissions-and-improve>. Accessed July 29, 2022.

“Greenhouse gases” as defined under AB 32 include CO₂, CH₄, N₂O, HFCs, PFCs, and SF₆. Since AB 32 was enacted, a seventh chemical, nitrogen trifluoride, has also been added to the list of GHGs. The California Air Resources Board (ARB) is the State agency charged with monitoring and regulating sources of GHGs. AB 32 states the following:

Global warming poses a serious threat to the economic wellbeing, public health, natural resources, and the environment of California. The potential adverse impacts of global warming include the exacerbation of air quality problems, a reduction in the quality and supply of water to the State from the Sierra snowpack, a rise in sea levels resulting in the displacement of thousands of coastal businesses and residences, damage to marine ecosystems and the natural environment, and an increase in the incidences of infectious diseases, asthma, and other human health-related problems.

The ARB approved the 1990 GHG emissions level of 427 MMT CO₂e on December 6, 2007.¹⁸ Therefore, to meet the State’s target, emissions generated in California in 2020 were required to be equal to or less than 427 MMT CO₂e. Emissions in 2020 in a business-as-usual (BAU) scenario were estimated to be 596 MMT CO₂e, which do not account for reductions from AB 32 regulations.¹⁹ At that rate, a 28 percent reduction was required to achieve the 427 MMT CO₂e 1990 inventory. In October 2010, the ARB prepared an updated 2020 forecast to account for the effects of the 2008 recession and slower forecasted growth. Without the benefits of adopted regulation, the 2020 inventory is now estimated at 545 MMT CO₂e. Therefore, under the updated forecast, a 21.7 percent reduction from a BAU scenario is required to achieve 1990 levels.²⁰

The State has made steady progress in implementing AB 32. The progress is shown in updated emission inventories prepared by ARB for 2000 through 2012 to show progress achieved to date.²¹ The State also achieved its target for 2010 of reducing GHG emissions to 2000 levels. As shown below, the 2010 emission inventory achieved this target. Also shown are the average reductions needed from all Statewide sources (including all existing sources) to reduce GHG emissions back to 1990 levels.

1990: 427 MMT CO₂e (AB 32 2020 Target)

2000: 463 MMT CO₂e (an average 8 percent reduction needed to achieve 1990 base)

2010: 450 MMT CO₂e (an average 5 percent reduction needed to achieve 1990 base)

2020: 545 MMT CO₂e BAU (an average 21.7 percent reduction from BAU needed to achieve 1990 base)

¹⁸ California Air Resources Board (ARB). 2007. Staff Report. California 1990 Greenhouse Gas Level and 2020 Emissions Limit. November 16, 2007. Website: www.arb.ca.gov/cc/inventory/pubs/reports/staff_report_1990_level.pdf. Accessed July 29, 2022.

¹⁹ California Air Resources Board (ARB). 2008. Climate Change Scoping Plan, a Framework for Change. December.

²⁰ California Air Resources Board (ARB). 2014. GHG 2020 Business-as-Usual Emissions Projection. Website: <https://ww2.arb.ca.gov/ghg-bau>. Accessed July 29, 2022.

²¹ California Air Resources Board (ARB). 2014. California Greenhouse Gas Emissions for 2000 to 2012—Trends of Emissions and Other Indicators. Website: http://www.arb.ca.gov/cc/inventory/pubs/reports/ghg_inventory_00-12_report.pdf. Accessed July 29, 2022.

The ARB's initial Climate Change Scoping Plan (Scoping Plan) contained measures designed to reduce the State's emissions to 1990 levels by the year 2020 to comply with AB 32.²² The Scoping Plan identified recommended measures for multiple GHG emission sectors and the associated emission reductions needed to achieve the year 2020 emissions target—each sector had a different emission reduction target. Most of the measures target the transportation and electricity sectors. As stated in the Scoping Plan, the key elements of the strategy for achieving the 2020 GHG target include:

- Expanding and strengthening existing energy efficiency programs as well as building and appliance standards.
- Achieving a Statewide renewables energy mix of 33 percent.
- Developing a California Cap-and-Trade Program that links with other Western Climate Initiative partner programs to create a regional market system.
- Establishing targets for transportation-related GHG emissions for regions throughout California and pursuing policies and incentives to achieve those targets.
- Adopting and implementing measures pursuant to existing State laws and policies, including California's clean car standards, goods movement measures, and the low carbon fuel standard (LCFS).
- Creating targeted fees, including a public goods charge on water use, fees on high global warming potential (GWP) gases, and a fee to fund the administrative costs of the State's long-term commitment to AB 32 implementation.

In addition, the Scoping Plan differentiates between "capped" and "uncapped" strategies. Capped strategies are subject to the ARB's Cap-and-Trade Program. The Scoping Plan states that the inclusion of these emissions within the Cap-and-Trade Program would help ensure that the year 2020 emission targets were met despite some degree of uncertainty in the emission reduction estimates for any individual measure. Implementation of the capped strategies is calculated to achieve sufficient reductions by 2020 to achieve the emission target contained in AB 32. Uncapped strategies that will not be subject to the cap-and-trade emissions limits and requirements were provided as a margin of safety by accounting for additional GHG emission reductions.²³

The Cap-and-Trade Program remains a key element of the Scoping Plan. It sets a Statewide limit on sources responsible for 85 percent of California's GHG emissions and establishes a price signal needed to drive long-term investment in cleaner fuels and more efficient use of energy. The Cap-and-Trade Program is designed to provide covered entities the flexibility to seek out and implement the lowest cost options to reduce emissions. The Cap-and-Trade Program conducted its first auction in November 2012. Compliance obligations began for power plants and large industrial sources in January 2013. Other significant milestones include linkage to Québec's cap-and-trade system in

²² California Air Resources Board (ARB). 2008. Climate Change Scoping Plan, a Framework for Change. December.

²³ California Air Resources Board (ARB). 2008. Climate Change Scoping Plan, a Framework for Change. December.

January 2014 and starting the compliance obligation for distributors of transportation fuels, natural gas, and other fuels in January 2015.²⁴

The Cap-and-Trade Program provides a firm cap, ensuring that the 2020 Statewide emission limit would not be exceeded. An inherent feature of the Cap-and-Trade Program is that it does not guarantee GHG emissions reductions in any discrete location or by any particular source. Rather, GHG emissions reductions are only guaranteed on an accumulative basis. As summarized by the ARB in the First Update:

The Cap-and-Trade Regulation gives companies the flexibility to trade allowances with others or take steps to cost-effectively reduce emissions at their own facilities. Companies that emit more have to turn in more allowances or other compliance instruments. Companies that can cut their GHG emissions have to turn in fewer allowances. But as the cap declines, aggregate emissions must be reduced. In other words, a covered entity theoretically could increase its GHG emissions every year and still comply with the Cap-and-Trade Program if there is a reduction in GHG emissions from other covered entities. Such a focus on aggregate GHG emissions is considered appropriate because climate change is a global phenomenon, and the effects of GHG emissions are considered cumulative.²⁵

The Cap-and-Trade Program works with other direct regulatory measures and provides an economic incentive to reduce emissions. If California's direct regulatory measures reduce GHG emissions more than expected, then the Cap-and-Trade Program will be responsible for relatively fewer emissions reductions. If California's direct regulatory measures reduce GHG emissions less than expected, then the Cap-and-Trade Program will be responsible for relatively more emissions reductions. Thus, the Cap-and-Trade Program assures that California will meet its 2020 GHG emissions reduction mandate:

The Cap-and-Trade Program establishes an overall limit on GHG emissions from most of the California economy—the “capped sectors.” Within the capped sectors, some of the reductions are being accomplished through direct regulations, such as improved building and appliance efficiency standards, the [Low Carbon Fuel Standard] LCFS, and the 33 percent [Renewables Portfolio Standard] RPS. Whatever additional reductions are needed to bring emissions within the cap is accomplished through price incentives posed by emissions allowance prices. Together, direct regulation and price incentives assure that emissions are brought down cost-effectively to the level of the overall cap. The Cap-and-Trade Regulation provides assurance that California's 2020 limit will be met because the regulation sets a firm limit on 85 percent of California's GHG emissions. In sum, the Cap-and-Trade Program will achieve aggregate, rather than site specific or project-level, GHG emissions reductions.

²⁴ California Air Resources Board (ARB). 2015. ARB Emissions Trading Program. Website: https://ww2.arb.ca.gov/sites/default/files/classic/cc/capandtrade/guidance/cap_trade_overview.pdf. Accessed July 29, 2022.

²⁵ California Air Resources Board (ARB). 2014. First Update to the Climate Change Scoping Plan. May.

Also, due to the regulatory architecture adopted by ARB in AB 32, the reductions attributed to the Cap-and-Trade Program can change over time depending on the State's emissions forecasts and the effectiveness of direct regulatory measures.²⁶

California Senate Bill 32

In 2016, the State Legislature passed SB 32, giving the ARB the statutory responsibility to include the 2030 target previously contained in former Governor Brown's Executive Order B-30-15 in the 2017 Scoping Plan Update. SB 32 states, "In adopting rules and regulations to achieve the maximum technologically feasible and cost-effective greenhouse gas emissions reductions authorized by this division, the state [air resources] board shall ensure that Statewide greenhouse gas emissions are reduced to at least 40 percent below the statewide greenhouse gas emissions limit no later than December 31, 2030." As such, SB 32 lays the foundation for the legislative reduction targets for 2030.

2017 Scoping Plan

The most recent version of the ARB's Scoping Plan, the 2017 Climate Change Scoping Plan Update (2017 Scoping Plan), addresses the SB 32 targets and was adopted on December 14, 2017. The major elements of the framework proposed to achieve the 2030 target are as follows:

1. SB 350
 - Achieve 50 percent Renewables Portfolio Standard by 2030.
 - Doubling of energy efficiency savings by 2030.
2. Low Carbon Fuel Standard
 - Increased stringency (reducing carbon intensity 18 percent by 2030, up from 10 percent in 2020).
3. Mobile Source Strategy (Cleaner Technology and Fuels Scenario)
 - Maintaining existing GHG standards for light- and heavy-duty vehicles.
 - Put 4.2 million Zero-Emission Vehicles (ZEVs) on the roads.
 - Increase ZEV buses, delivery and other trucks.
4. Sustainable Freight Action Plan
 - Improve freight system efficiency.
 - Maximize use of near-ZEVs and equipment powered by renewable energy.
 - Deploy over 100,000 zero-emission trucks and equipment by 2030.
5. Short-Lived Climate Pollutant Reduction Strategy
 - Reduce emissions of methane and hydrofluorocarbons 40 percent below 2013 levels by 2030.
 - Reduce emissions of black carbon 50 percent below 2013 levels by 2030.
6. SB 375 Sustainable Communities Strategies
 - Increased stringency of 2035 targets.
7. Post-2020 Cap-and-Trade Program
 - Declining caps, continued linkage with Québec, and linkage to Ontario, Canada.

²⁶ California Air Resources Board (ARB). 2014. First Update to the Climate Change Scoping Plan. May.

- The ARB will look for opportunities to strengthen the program to support more air quality co-benefits, including specific program design elements. In Fall 2016, the ARB staff described potential future amendments including reducing the offset usage limit, redesigning the allocation strategy to reduce free allocation to support increased technology and energy investment at covered entities and reducing allocation if the covered entity increases criteria or toxics emissions over some baseline.
8. 20 percent reduction in GHG emissions from the refinery sector.
 9. By 2018, develop Integrated Natural and Working Lands Action Plan to secure California's land base as a net carbon sink.

California Senate Bill 350: Clean Energy and Pollution Reduction Act

In 2015, the State Legislature approved, and former Governor Brown signed, SB 350, which reaffirmed California's commitment to reducing its GHG emissions and addressing climate change. Key provisions include an increase in the RPS, higher energy efficiency requirements for buildings, initial strategies toward a regional electricity grid, and improved infrastructure for electric vehicle (EV) charging stations. Specifically, SB 350 requires the following to reduce Statewide GHG emissions:

- Increase the amount of electricity procured from renewable energy sources from 33 percent to 50 percent by 2030, with interim targets of 40 percent by 2024, and 25 percent by 2027.
- Double the energy efficiency in existing buildings by 2030. This target will be achieved through the California Public Utility Commission, the CEC, and local publicly owned utilities.
- Reorganize the Independent System Operator (ISO) to develop more regional electrified transmission markets and to improve accessibility in these markets, which will facilitate the growth of renewable energy markets in the western United States.²⁷

California Senate Bill 100: Renewable Portfolio Standard Program

On September 10, 2018, Governor Newsom signed SB 100, requiring California electricity utility providers to supply all in-state end users with electricity sourced from renewable or carbon-free sources by 2045. Specifically, SB 100 accelerates previously established RPS goals and requires that the program achieve 50 percent of electricity sourced from renewables by December 31, 2026, 60 percent by December 31, 2030, and 100 percent of electricity sourced from carbon-free sources by December 31, 2045. For clarification, renewable sources, as described herein, includes all renewable sources (e.g., solar, small hydro, wind) but notably omits large-scale hydroelectric and nuclear electricity generation; carbon-free sources include all renewable sources as well as large-scale hydroelectric and nuclear electricity generation.

California Assembly Bill 1493: Pavley Regulations and Fuel Efficiency Standards

California AB 1493, enacted on July 22, 2002, required the ARB to develop and adopt regulations that reduce GHGs emitted by passenger vehicles and light-duty trucks. Implementation of the

²⁷ California Legislative Information (California Leginfo). 2015. Senate Bill 350 Clean Energy and Pollution Reduction Act of 2015. Website: https://leginfo.legislature.ca.gov/faces/billNavClient.xhtml?bill_id=201520160SB350. Accessed July 31, 2022.

regulation was delayed by lawsuits filed by automakers and by the EPA's denial of an implementation waiver, but the EPA granted the requested waiver in 2009.²⁸ Near term emissions standards have been implemented by ARB for vehicle model years between 2009 to 2016. The implementation of AB 1493 has subsequently been incorporated into Amendments to the Low Emission Vehicle (LEV) Program referred to as LEV III, or the Advanced Clean Cars program.

The Advanced Clean Cars program combines the control of smog-causing pollutants and GHG emissions into a package of requirements for model years 2017 through 2025. The regulation is estimated to reduce GHGs from new cars by 34 percent from 2016 levels by 2025. The rules are designed to reduce pollutants from gasoline and diesel-powered cars, and to deliver increasing numbers of zero-emission technologies, such as full battery electric cars, newly emerging plug-in hybrid EVs and hydrogen fuel cell cars, along with supporting the deployment of fueling infrastructure for hydrogen fuel cell vehicles planned for deployment in California.²⁹

California Senate Bill 375: Sustainable Communities and Climate Protection Act

SB 375 was signed into law on September 30, 2008. According to SB 375, the transportation sector is the largest contributor of GHG emissions, which emits over 40 percent of the total GHG emissions in California. SB 375 states, “[w]ithout improved land use and transportation policy, California will not be able to achieve the goals of AB 32.” The statute directed ARB to develop GHG reduction targets for Metropolitan Planning Organizations (MPOs) across the State. SB 375 does the following: (1) requires MPOs to include sustainable community strategies in their regional transportation plans for reducing GHG emissions, (2) aligns planning for transportation and housing, and (3) creates specified incentives for the implementation of the strategies.

California Senate Bill 1368: Emission Performance Standards

SB 1368, adopted in 2006, directs the California Public Utilities Commission to adopt a performance standard for GHG emissions for the future power purchases of California utilities. SB 1368 seeks to limit carbon emissions associated with electrical energy consumed in California by forbidding procurement arrangements for energy longer than 5 years from resources that exceed the emissions of a relatively clean, combined cycle natural gas power plant. Because of the carbon content of its fuel source, a coal-fired plant cannot meet this standard because such plants emit roughly twice as much carbon as natural gas, combined cycle plants. Accordingly, the new law effectively prevents California's utilities from investing in, otherwise financially supporting, or purchasing power from new coal plants located in or out of the State. The California Public Utilities Commission (CPUC) adopted the regulations required by SB 1368 on August 29, 2007. The regulations implementing SB 1368 establish a standard for baseload generation owned by, or under long-term contract to, publicly owned utilities of 1,100 lb. CO₂ per megawatt-hour (MWh).

California Senate Bill X7-7: Water Conservation Act

This 2009 legislation directed urban retail water suppliers to set individual 2020 per capita water use targets and begin implementing conservation measures to achieve those goals. Meeting this

²⁸ California Air Resources Board (ARB). 2013. Clean Car Standards—Pavley, Assembly Bill 1493. Website: https://www.gsweventcenter.com/GSW_RTC_References/2015_0915_CleanAirStandards_Pavley.pdf. Accessed July 31, 2022.

²⁹ California Air Resources Board (ARB). 2011. Status of Scoping Plan Recommended Measures.

Statewide goal of 20 percent decrease in demand would have resulted in a reduction of almost 2 million acre-feet in urban water use in 2020.

California Air Resources Board's Truck and Bus Regulation

The latest amendments to the Truck and Bus regulation became effective on December 31, 2014. The amended regulation requires diesel trucks and buses that operate in California to be upgraded to reduce emissions. Newer heavier trucks and buses must meet particulate matter (PM) filter requirements beginning January 1, 2012. Lighter and older heavier trucks had to be replaced by January 1, 2015. By January 1, 2023, nearly all trucks and buses will need to have 2010 model year engines or equivalent.

The regulation applies to nearly all privately and federally owned diesel-fueled trucks and buses and to privately and publicly owned school buses with a gross vehicle weight rating greater than 14,000 pounds. The regulation provides a variety of flexibility options tailored to fleets operating low use vehicles, fleets operating in selected vocations like agricultural and construction, and small fleets of three or fewer trucks.³⁰

California Code of Regulations Title 20: Appliance Efficiency Regulations

California Code of Regulations, Title 20: Division 2, Chapter 4, Article 4, Sections 1601-1608: Appliance Efficiency Regulations regulates the sale of appliances in California. The Appliance Efficiency Regulations include standards for both federally regulated appliances and non-federally regulated appliances. Twenty-three categories of appliances are included in the scope of these regulations. The standards within these regulations apply to appliances that are sold or offered for sale in California, except those sold wholesale in California for final retail sale outside the State and those designed and sold exclusively for use in recreational vehicles or other mobile equipment.

California Code of Regulations Title 24: Energy Efficiency Standards

Part 6 (Energy Efficiency Standards for Residential and Nonresidential Buildings)

California Code of Regulations Title 24 Part 6 (California's Energy Efficiency Standards for Residential and Nonresidential Buildings) was first adopted in 1978 in response to a legislative mandate to reduce California's energy consumption. The standards are updated periodically to allow consideration and possible incorporation of new energy efficient technologies and methods. Energy efficient buildings require less electricity; therefore, increased energy efficiency reduces fossil fuel consumption and decreases GHG emissions. The 2019 Building Energy Efficiency Standards (Energy Code) went into effect on January 1, 2020. The 2022 Energy Code standards were adopted on August 11, 2021, and buildings whose permit applications are applied for on or after January 1, 2023, must comply with the 2022 Energy Code.

California Code of Regulations Title 24: California Green Building Standards Code

California Code of Regulations Title 24, Part 11, is a comprehensive and uniform regulatory code for all residential, commercial, and school buildings that went into effect on January 1, 2011. The Code is updated on a regular basis, with the most recent update in effect consisting of the 2019 California Green Building Standards Code (CALGreen) that became effective January 1, 2020. CEC has approved

³⁰ California Air Resources Board (ARB). 2019. Truck and Bus Regulation Compliance Requirement Overview.

the latest 2022 CALGreen Code that will go into effect on January 1, 2023.³¹ Local jurisdictions are permitted to adopt more stringent requirements, as State law provides methods for local enhancements. The Code recognizes that many jurisdictions have developed existing construction ordinances and defers to them as the ruling guidance, provided that they provide a minimum 50 percent diversion requirement. The Code also provides exemptions for areas not served by construction and demolition recycling infrastructure. The State Building Code provides the minimum standard that buildings need to meet in order to be certified for occupancy, which is generally enforced by the local building official.

CALGreen (California Code of Regulations [CCR] Title 24, Part 11) requires:

- **Short-term bicycle parking.** If a commercial project is anticipated to generate visitor traffic, provide permanently anchored bicycle racks within 200 feet of the visitors' entrance, readily visible to passers-by, for 5 percent of visitor motorized vehicle parking capacity, with a minimum of one two-bike capacity rack (§ 5.106.4.1.1).
- **Long-term bicycle parking.** For buildings with over 10 tenant-occupants, provide secure bicycle parking for 5 percent of tenant-occupied motorized vehicle parking capacity, with a minimum of one space (§ 5.106.4.1.2).
- **Designated parking.** Provide designated parking in commercial projects for any combination of low-emitting, fuel-efficient and carpool/van pool vehicles as shown in Table 5.106.5.2 (§ 5.106.5.2).
- **Recycling by Occupants.** Provide readily accessible areas that serve the entire building and are identified for the depositing, storage and collection of nonhazardous materials for recycling (§ 5.410.1).
- **Construction waste.** A minimum 65 percent diversion of construction and demolition waste from landfills. (5.408.1, A5.408.3.1 [nonresidential], A5.408.3.1 [residential]). All (100 percent) of trees, stumps, rocks and associated vegetation and soils resulting from land clearing shall be reused or recycled (§ 5.408.3).
- **Wastewater reduction.** Each building shall reduce the generation of wastewater by one of the following methods:
 - 10. The installation of water-conserving fixtures or
 - 11. Using nonpotable water systems (§ 5.303.4).
- **Water use savings.** 20 percent mandatory reduction in indoor water use with voluntary goal standards for 30, 35, and 40 percent reductions (§ 5.303.2, A5303.2.3 [nonresidential]).
- **Water meters.** Separate water meters for buildings in excess of 50,000 square feet or buildings projected to consume more than 1,000 gallons per day (§ 5.303.1).
- **Irrigation efficiency.** Moisture-sensing irrigation systems for larger landscaped areas (§ 5.304.3).

³¹ California Energy Commission (CEC). 2021. CEC Approves 2022 CALGreen Building Standards Code. Website: <http://calenergycommission.blogspot.com/2021/10/cec-approves-2022-calgreen-building.html>. Accessed September 2, 2022.

- **Materials pollution control.** Low-pollutant emitting interior finish materials such as paints, carpet, vinyl flooring and particleboard (§ 5.404).
- **Building commissioning.** Mandatory inspections of energy systems (i.e., heat furnace, air conditioner, mechanical equipment) for nonresidential buildings over 10,000 square feet to ensure that all are working at their maximum capacity according to their design efficiencies (§ 5.410.2).

California Model Water Efficient Landscape Ordinance

The Model Water Efficient Landscape Ordinance (MWELO) was required by the AB 1881 Water Conservation Act. The MWELO required local agencies to adopt a local Landscape Ordinance at least as effective in conserving water as the MWELO by January 1, 2010. Reductions in water use of 20 percent consistent with the SB X7-7 2020 mandate were required. Former Governor Brown's Drought Executive Order of April 1, 2015 (Executive Order B-29-15) directed DWR to update the Ordinance through expedited regulation. The California Water Commission approved the revised Ordinance on July 15, 2015, which became effective on December 15, 2015. New development projects that include landscaped areas of 500 square feet or more are subject to the Ordinance. The update requires:

- More efficient irrigation systems
- Incentives for graywater usage
- Improvements in on-site stormwater capture
- Limiting the portion of landscapes that can be planted with high water use plants
- Reporting requirements for local agencies.

California Public Utilities Code

The CPUC regulates privately owned telecommunication, electric, natural gas, water, railroad, rail transit, and passenger transportation companies. It is the responsibility of the CPUC to (1) assure California utility customers receive safe, reliable utility service at reasonable rates; (2) protect utility customers from fraud; and (3) promote a healthy California economy. The Public Utilities Code, adopted by the legislature, defines the jurisdiction of the CPUC.

California Executive Order B-55-18 (Greenhouse Gas Emissions Reduction Targets)

On September 10, 2018, former Governor Brown issued Executive Order B-55-18, which established the long-term climate goal of achieving Statewide carbon neutrality by 2045. Executive Order B-55-18 identified a new Statewide goal to achieve carbon neutrality as soon as possible, and no later than 2045, and achieve and maintain net neutrality emissions thereafter. This emissions goal is in addition to the existing targets established by Executive Orders S-3-05 and B-30-15 and SB 32, as described in greater detail below. This Executive Order also directs the ARB to work with other State agencies to identify and recommend measures to achieve this goal.

California Executive Order S-01-07: Low Carbon Fuel Standard

Former Governor Schwarzenegger signed Executive Order S-01-07 on January 18, 2007. The order mandated that a Statewide goal be established to reduce the carbon intensity of California's

transportation fuels by at least 10 percent by 2020. In particular, the Executive Order established an LCFS and directed the Secretary for Environmental Protection to coordinate the actions of the CEC, the ARB, the University of California, and other agencies to develop and propose protocols for measuring the “lifecycle carbon intensity” of transportation fuels.

California Executive Order N-79-20

On September 23, 2020, Governor Newsom issued Executive Order N-79-20 establishing a goal that 100 percent of new passenger cars and trucks sold in California shall be zero-emission by 2035. The Executive Order also sets a goal that, where feasible, all operations include zero-emission medium- and heavy-duty trucks by 2045, and drayage trucks by 2035. Off-road vehicles have a goal to transition to 100 percent ZEVs by 2035, where feasible. While in-state sales of EVs will increase through 2045, the State does not currently have legislation which will restrict or preclude the use of fossil-fueled vehicles by or after 2045.

California Executive Order S-13-08

Executive Order S-13-08 states that “climate change in California during the next century is expected to shift precipitation patterns, accelerate sea level rise and increase temperatures, thereby posing a serious threat to California’s economy, to the health and welfare of its population and to its natural resources.” Pursuant to the requirements in the order, the 2009 California Climate Adaptation Strategy was adopted, which is the “. . . first Statewide, multi-sector, region-specific, and information-based climate change adaptation strategy in the United States.” Objectives include analyzing risks of climate change in California, identifying and exploring strategies to adapt to climate change, and specifying a direction for future research.

California Executive Order B-30-15

On April 29, 2015, former Governor Brown issued an Executive Order to establish a California GHG emissions reduction target of 40 percent below 1990 levels by 2030. The Governor’s Executive Order aligned California’s GHG reduction targets with those of leading international governments ahead of the United Nations Climate Change Conference in Paris late 2015. The Executive Order set a new interim Statewide GHG emission reduction target to reduce GHG emissions to 40 percent below 1990 levels by 2030 in order to ensure California meets its target of reducing GHG emissions to 80 percent below 1990 levels by 2050 and directs the ARB to update the Climate Change Scoping Plan to express the 2030 target in terms of MMT CO₂e. The Executive Order also requires the State’s climate adaptation plan to be updated every three years and for the State to continue its climate change research program, among other provisions. As with Executive Order S-3-05, this Executive Order is not legally enforceable against local governments and the private sector. Legislation that would update AB 32 to make post 2020 targets and requirements a mandate is in process in the State Legislature.

California Senate Bill 97 and the California Environmental Quality Act Guidelines Update

Passed in August 2007, SB 97 added Section 21083.05 to the Public Resources Code. The Code states:

“(a) On or before July 1, 2009, the Office of Planning and Research shall prepare, develop, and transmit to the Resources Agency guidelines for the mitigation of GHG emissions or the effects of GHG emissions as required by this division, including, but not limited to, effects associated with transportation or energy consumption. (b) On or before January 1, 2010, the Resources Agency shall certify and adopt guidelines prepared and developed by the Office of Planning and Research pursuant to subdivision (a).”

Section 21097 was also added to the Public Resources Code, which provided an exemption until January 1, 2010, for transportation projects funded by the Highway Safety, Traffic Reduction, Air Quality, and Port Security Bond Act of 2006 or projects funded by the Disaster Preparedness and Flood Prevention Bond Act of 2006, in stating that the failure to analyze adequately the effects of GHGs would not violate CEQA. The Natural Resources Agency completed the approval process, and the Amendments became effective on March 18, 2010.

The 2010 CEQA Amendments provide guidance to public agencies regarding the analysis and mitigation of the effects of GHG emissions in CEQA documents. The CEQA Amendments fit within the existing CEQA framework by amending existing State CEQA Guidelines to reference climate change. Section 15064.4(b) of the State CEQA Guidelines provides direction for lead agencies for assessing the significance of impacts of GHG emissions:

- The extent to which the project may increase or reduce GHG emissions as compared to the existing environmental setting.
- Whether the project emissions exceed a threshold of significance that the lead agency determines applies to the project.
- The extent to which the project complies with regulations or requirements adopted to implement a Statewide, regional, or local plan for the reduction or mitigation of GHG emissions. Such regulations or requirements must be adopted by the relevant public agency through a public review process and must include specific requirements that reduce or mitigate the project’s incremental contribution of GHG emissions. If there is substantial evidence that the possible effects of a particular project are still cumulatively considerable notwithstanding compliance with the adopted regulations or requirements, an EIR must be prepared for the project.

The State CEQA Guidelines amendments do not identify a threshold of significance for GHG emissions, nor do they prescribe assessment methodologies or specific mitigation measures. Instead, they call for a “good-faith effort, based on available information, to describe, calculate, or estimate the amount of greenhouse gas emissions resulting from a project.” The amendments encourage lead agencies to consider many factors in performing a CEQA analysis and preserve lead agencies’ discretion to make their own determinations based upon substantial evidence. The amendments also encourage public agencies to make use of programmatic mitigation plans and programs from which to tier when they perform individual project analyses.

Also amended were State CEQA Guidelines Sections 15126.4 and 15130, which address mitigation measures and cumulative impacts, respectively. GHG mitigation measures are referenced in general

terms, but no specific measures are championed. The revision to the cumulative impact discussion requirement (Section 15130) simply directs agencies to analyze GHG emissions in an EIR when a project's incremental contribution of emissions may be cumulatively considerable; however, it does not answer the question of when emissions are cumulatively considerable.

State CEQA Guidelines Section 15183.5 permits programmatic GHG analysis and later project-specific tiering, as well as the preparation of Greenhouse Gas Reduction Plans. Compliance with such plans can support a determination that a project's cumulative effect is not cumulatively considerable, according to Section 15183.5(b).

Center for Biological Diversity v. California Department of Fish and Wildlife (California Supreme Court GHG Ruling)

In a November 30, 2015, ruling on the Newhall Ranch project, the California Supreme Court in *Center for Biological Diversity v. California Department of Fish and Wildlife* (2015) 62 Cal.4th 204 concluded that whether the project was consistent with meeting Statewide emission reduction goals is a legally permissible criterion of significance, but the significance finding for the project was not supported by a reasoned explanation based on substantial evidence.³² The Court offered potential solutions to address this issue, which are summarized below. Specifically, the Court advised that:

- **Substantiation of Project Reductions from BAU.** A lead agency may use a BAU comparison based on the Scoping Plan's methodology if it also substantiates the reduction a particular project must achieve to comply with Statewide goals (page 25).
- **Compliance with Regulatory Programs or Performance Based Standards.** A lead agency "might assess consistency with AB 32's goal in whole or part by looking to compliance with regulatory programs designed to reduce greenhouse gas emissions from particular activities" (page 26).
- **Compliance with GHG Reduction Plans or Climate Action Plans.** A lead agency may utilize "geographically specific GHG emission reduction plans" such as Climate Action Plans (CAPs) or GHG emission reduction plans to provide a basis for the tiering or streamlining of project-level CEQA analysis (page 26).
- **Compliance with Local Air District Thresholds.** A lead agency may rely on "existing numerical thresholds of significance for greenhouse gas emissions" adopted by, for example, local air districts (page 27).

Therefore, consistent with State CEQA Guidelines Appendix G, the three factors identified in State CEQA Guidelines Section 15064.4 and the Newhall Ranch opinion, GHG impacts would be considered potentially significant if a project would:

- Conflict with a compliant GHG Reduction Plan if adopted by the lead agency;
- Exceed the applicable GHG Reduction Threshold; or

³² Supreme Court of California. 2015. *Center for Biological Diversity v. California Department of Fish and Wildlife*. November 30. Website: <http://climatecasechart.com/case/center-for-biological-diversity-v-california-department-of-fish-and-wildlife/>. Accessed August 29, 2022.

- Conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emission of GHGs.

Regional

Plan Bay Area 2050: Strategy for a Sustainable Region

On October 21, 2021, the Association of Bay Area Governments (ABAG) and the Metropolitan Transportation Commission (MTC) adopted Plan Bay Area 2050, an integrated transportation and land use strategy through 2050 that updates the nine-county region's long-range plan to meet the requirements of SB 375. Working in collaboration with cities and counties, the Plan Bay Area 2050 advances initiatives to expand housing and transportation choices, create healthier communities, and build a stronger regional economy. Plan Bay Area 2050 remains on track to meet a 20 percent per capita reduction of GHG emissions by 2035 from 2005 conditions.³³

Bay Area Air Quality Management District 2050 Climate Resolution Goals

In 2013, the Bay Area Air Quality Management District (BAAQMD) Board of Directors approved a Resolution (No. 2013-11) adopting a GHG goal and a commitment to developing a regional climate protection strategy that commits to the following:

- Setting a goal for the Bay Area region to reduce GHG emissions to 80 percent below 1990 levels by 2050.
- Developing a Regional Climate Protection Strategy to make progress toward the 2050 goal and to complement existing climate action efforts at the State, regional, and local levels.
- Preparing a work program to guide the BAAQMD climate protection activities in the near term.

Bay Area Air Quality Management District 2017 Clean Air Plan

BAAQMD adopted the 2017 Clean Air Plan on April 19, 2017, to comply with State air quality planning requirements set forth in the California Health and Safety Code. The 2017 Clean Air Plan includes a wide range of control measures designed to decrease emissions of the air pollutants that are most harmful to Bay Area residents, such as PM, ozone, and toxic air contaminants (TACs), to reduce emissions of methane and other "super-greenhouse gases" that are potent climate pollutants in the near term; and to decrease emissions of carbon dioxide by reducing fossil fuel combustion.

The proposed control strategy for the 2017 Clean Air Plan consists of 85 specific control measures targeting a variety of local, regional, and global pollutants. The control measures have been developed for stationary sources, transportation, energy, buildings, agriculture, natural and working lands, waste management, water, and super-GHG pollutants. Implementation of some of the control measures could involve retrofitting, replacing, or installing new air pollution control equipment, changes in product formulations, or construction of infrastructure that have the potential to create air quality impacts.

³³ Metropolitan Transportation Commission (MTC) and Association of Bay Area Governments (ABAG). 2021. Plan Bay Area 2050. October 21.

The BAAQMD CEQA Guidelines set forth criteria for determining consistency with the 2017 Clean Air Plan. In general, a project is considered consistent if (1) the project supports the primary goals of the 2017 Clean Air Plan, (2) includes control measures and (3) does not interfere with implementation of the 2017 Clean Air Plan measures.

Bay Area Air Quality Management District CEQA Air Quality Guidelines

The purpose of the BAAQMD's 2017 CEQA Air Quality Guidelines is to assist lead agencies in evaluating air quality and GHG impacts of projects and plans proposed in the San Francisco Bay Area Air Basin (SFBAAB). The most recent version of the CEQA Air Quality Guidelines was published May 2017 and includes revisions made to address the Supreme Court's opinion (*California Building Industry Association v. Bay Area Air Quality Management District*, December 2015).³⁴ The BAAQMD's 2017 CEQA Air Quality Guidelines contain instructions on how to evaluate, measure, and mitigate air quality impacts generated from land development construction and operation activities. They focus on criteria air pollutant, GHG, toxic air contaminant, and odor emissions generated from plans or projects and are intended to help lead agencies navigate through the CEQA process. The 2017 CEQA Air Quality Guidelines are presented as advisory recommendations based on substantial evidence to assist local agencies.

In addition to the BAAQMD's 2017 CEQA Air Quality Guidelines, the BAAQMD adopted an updated Justification Report to support BAAQMD newly updated-recommended GHG significance thresholds in April 2022.³⁵ The Justification Report provides recommended significance thresholds for GHGs for land use development projects and plans and replaces those recommended in the BAAQMD's 2017 CEQA Air Quality Guidelines; however, the methodologies for quantifying and analyzing GHG emissions from land use development projects and plans contained in the 2017 Guidelines were still recommended by the BAAQMD at the time this analysis was prepared.

As previously discussed, State CEQA Guidelines Section 15183.5(b) allows projects and plans to be analyzed through a streamlined or tiered approach utilizing an adopted Greenhouse Gas Reduction Plan. According to both State CEQA Guidelines Section 15183.5(b) and the BAAQMD's 2017 CEQA Air Quality Guidelines, for a Greenhouse Gas Reduction Plan to be considered a "qualified" reduction strategy capable of being utilized for a streamlined or tiered analysis under CEQA that plan must meet the following requirements:^{36,37}

- Quantify GHG emissions, both existing and projected over a specified time period, resulting from activities within a defined geographic area;

³⁴ In March 2012, the Alameda County Superior Court ordered the BAAQMD to set aside use of the significance thresholds within the BAAQMD 2010 CEQA Guidelines and cease dissemination until they complete an assessment of the environmental effects of the thresholds in accordance with CEQA. The Court found that the thresholds, themselves, constitute a "project" for which environmental review is required. In August 2013, the First District Court of Appeal reversed the Alameda County Superior Court's decision. The Court held that adoption of the thresholds was not a "project" subject to CEQA because environmental changes that might result from their adoption were too speculative to be considered "reasonably foreseeable" under CEQA. In December 2015, the California Supreme Court reversed the Court of Appeal's decision and remanded the matter back to the appellate court to reconsider the case in light of the Supreme Court's opinion.

³⁵ Bay Area Air Quality Management District (BAAQMD). 2022. Justification Report: CEQA Thresholds for Evaluating the Significance of Climate Impacts from Land Use Projects and Plans. April.

³⁶ Bay Area Air Quality Management District (BAAQMD). 2017. California Environmental Quality Act Air Quality Guidelines. May.

³⁷ Association of Environmental Professionals (AEP). 2022. 2022 CEQA California Environmental Quality Act Statute and Guidelines.

- Establish a level, based on substantial evidence, below which the contribution to GHG emissions from activities covered by the plan would not be cumulatively considerable;
- Identify and analyze the GHG emissions resulting from specific actions or categories of actions anticipated within the geographic area;
- Specify measures or a group of measures, including performance standards, that substantial evidence demonstrates, if implemented on a project-by-project basis, would collectively achieve the specified emissions level;
- Establish a mechanism to monitor the plan’s progress toward achieving the level and to require amendments if the plan is not achieving specified levels; and
- Be adopted in a public process following environmental review.

The City recently adopted its latest Climate Action Plan 2.0 (CAP 2.0) in March 2022. The CAP 2.0 sets a target to reduce GHG emissions to 4.1 MT CO₂e per capita by 2030 and supports progress toward per capita carbon neutrality by 2045.³⁸ The CAP 2.0 includes a quantification of existing (2017)³⁹ and projected (2030) emissions, establishes an emissions significance level for activities covered by the CAP 2.0, identifies and analyzes GHG emissions resulting from City and community operations and growth, contains actions and measures sufficient to meet the previously identified emissions goal, establishes mechanisms to monitor progress of the actions and measures intended to reduce emissions, and was adopted through a public process and environmental review.⁴⁰ As such, the CAP 2.0 is considered a qualified reduction strategy pursuant to State CEQA Guidelines Section 15183.5(b) as well as the BAAQMD’s CEQA Air Quality Guidelines.

Local

City of Pleasanton

City of Pleasanton General Plan

The City has taken several steps to address climate change: first, to understand the nature and extent of GHG production from City operations and from the community; second, to incorporate GHG reduction measures into the General Plan. The General Plan sets forth the following goals and policies to reduce GHG impacts.

Air Quality and Climate Change Element

Policy 6 Reduce air pollution and the production of greenhouse gases by increasing energy efficiency, conservation, and the use of renewable resources.

Program 6.1 Develop a Greenhouse Gas (GHG) Emissions Reduction Plan and/or Climate Action Plan for the City to control and reduce net GHG emissions and the effects of climate change. Development of this plan(s) shall include the following steps: (1) conduct a baseline analysis (GHG emissions inventory); (2) adopt an emissions reduction target; (3) develop strategies and actions for reducing emissions; (4) develop

³⁸ City of Pleasanton. 2022. Final Climate Action Plan 2.0. March.

³⁹ Because 2017 was the latest year with a complete GHG inventory prepared for the City at the time of CAP 2.0 preparation, it was utilized as a baseline year in the CAP 2.0.

⁴⁰ Ibid.

strategies and actions for adapting to climate change; (5) implement strategies and actions; and (6) monitor emissions and verify results a minimum of every five years starting in 2015.

Program 6.2 Adopt standard methodology for estimating greenhouse gas emissions from development projects and utilize this methodology as part of the project review process.

Program 6.3 For development approved prior to adoption of a Climate Action Plan, require the following Best Management Practices.

- **BMP 1:** Single- and multi-family residential and commercial development to comply with the City of Pleasanton’s Green Building Ordinance. As far as feasible, residential projects should incorporate: resource efficient landscaping, energy efficient hot water distribution systems; high efficiency toilets and other low flow plumbing fixtures; high efficiency heating and cooling systems; pre-plumbing for solar water heating; installation of wiring conduit for future photovoltaic systems; installation of Energy Star appliances; and Green Points in the Community Design and Planning category.
- **BMP 2:** Development shall incorporate energy efficient appliances and systems that meet Energy Star standards.
- **BMP 3:** Where feasible, incorporate solar roofs (or other alternative energy measures) into commercial development sufficient to meet 12.5 percent of the building’s annual energy usage. Calculations of energy savings may be prepared at the construction drawing stage. Where feasible, residential development to be solar-ready, including proper solar orientation, electrical conduit installed for solar electric system wiring, plumbing installed for solar hot water system, and space provided for solar hot water storage tank.
- **BMP 4:** Require transit and bicycle/pedestrian connections in new development, where feasible.
- **BMP 5:** For commercial/industrial projects, prepare and implement a voluntary Trip Reduction Plan, using the resources available through the City of Pleasanton’s Transportation Systems Management program as described in Chapter 17.24 of the Pleasanton Municipal Code. Trip reduction goal of 15 percent within five years and 25 percent within 10 years, compared to “business as usual.”
- **BMP 6:** Require priority facilities for alternative fueled vehicles, such as priority parking and recharging facilities, where feasible.
- **BMP 7:** Development and demolition to comply with the City’s Construction and Demolition Debris Ordinance (ordinance currently in draft form).
- **BMP 8:** In new commercial and multi-family projects, include facilities to accommodate recycling consistent with the City’s programs.
- **BMP 9:** Incorporate “heat island” treatments that include cool roofs, cool pavements, and/or strategically placed shade trees.

Implement programs from the Energy Element including those related to green building, such as encouraging passive solar construction, as well as those related to reducing energy from appliances, equipment, and lighting. Implement programs from the Public Facilities and Community Programs Element to reduce solid waste.

Furthermore, implement the program in the Water Element to conserve Pleasanton's urban forest as well as the Community Character Element to replace and protect street trees. Tree shade not only helps lower energy use during hot months, also most tree species remove air pollutants from the environment.

Housing Element

The Housing Element is the primary tool used by the State to ensure local governments are appropriately planning for and accommodating enough housing across all income levels for the planning period 2023-2031. The Housing Element is a mandatory part of a jurisdiction's General Plan, but it differs from other General Plan elements in two key aspects: (1) it must be updated every eight years for jurisdictions within an MPO, such as ABAG; and (2) it must also be reviewed and approved by the California Department of Housing and Community Development (HCD) to ensure compliance with statutory requirements. Goals, policies, and programs regarding GHG emissions in the Housing Element are provided in Chapter 2, Project Description, specifically, Goal 6, Policies 6.1, 6.4, 6.5, and Programs 6.1, 6.2, 6.3, 6.4, and 6.5 provide guidance for reducing GHG emissions.

City of Pleasanton Climate Action Plan

The CAP 2.0 sets a target to reduce GHG emissions to 4.1 MT CO₂e per capita by 2030 and work toward per capita carbon neutrality by 2045.⁴¹ The CAP 2.0 includes the following strategies and actions that would support the reduction of GHG emissions in the City:

Transportation and Land Use

Reduce GHG emissions from transportation and land use which will enhance community mobility, improve public health, and result in cost savings.

Strategy TLU-1 The City of Pleasanton will expand existing Zero-Emission Vehicle (ZEV) fueling infrastructure throughout the community and transition the municipal fleet to EVs. Even with shifts toward active and public transportation, many community members in Pleasanton will still own or lease cars due to proximity and convenience. Acknowledging that car use will continue to persist (and perhaps dominate), this strategy is pivotal to reducing Pleasanton's emissions. By engaging the local community, including school districts and regional organizations, the City of Pleasanton will educate key audiences and identify funding partnerships to support the switch to ZEVs (e.g., electric or hydrogen fuel celled vehicles). This switch will not only reduce local GHG emissions, but also improve local air quality—especially near major roadways.

⁴¹ City of Pleasanton. 2022. Final Climate Action Plan 2.0. March.

Strategy TLU-2 Advance active, shared, and public transportation. Through continued work to support the Valley Link project and implement the City’s Trail Master Plan, Bicycle and Pedestrian Master Plan, and Complete Streets program, the City is actively integrating accessible infrastructure that accommodates multiple modes of transportation. The City will continue to expand bicycle infrastructure, encourage transit ridership, and invest in school programs that reduce VMT for curricular and co-curricular activities. The City’s investments in active, shared, and public transportation must expand into all areas of the City and ensure reliable access to alternative transportation options. Convenience, affordability, and ease of use are imperative to the success of alternative transportation programs, as options that are inconvenient and difficult to navigate will likely not be used.

Strategy TLU-3 Advance sustainable land use. Since Pleasanton’s population and job base is expected to increase, General Plan Housing Element implementation and LEED ND will be essential to support not only responsible community development but reduce VMT and provide access to active and/or shared transportation. This strategy will prioritize housing near transit and job centers and encourage sustainable land development for new projects that get built. Current hurdles to active and public transit include convenience and accessibility linked to land use patterns in Pleasanton. Some of these issues can be solved for future development through conscious efforts to develop with sustainable principles from plan concept to implementation.

Buildings and Energy

Reduce GHG emissions from buildings and associated energy consumption and increase buildings and energy resilience which will result in cost savings, improved public health, and improved infrastructure.

Strategy BE-1 Advance the decarbonization of buildings. Pleasanton is now participating in EBCE’s Renewable 100 program, ensuring a high degree of Pleasanton is powered by 100 percent renewable energy and that low-income residents have access to discounted programs to keep energy affordable. Shifting from natural gas to electric (e.g., heat sources in homes) in all new and existing buildings will address the biggest remaining source of building emissions—natural gas—and build a foundation for fully transitioning to carbon-free renewable energy. Making the transition to all-electric will support green job creation and improved indoor air quality, as natural gas equipment is replaced and new buildings are built electric. Paired with increased energy efficiency and small-scale renewable energy and storage, buildings will also become more resilient to fluctuations in energy supply.

Strategy BE-2 Improve energy consumption and efficiency. As the City electrifies buildings to ensure that they are powered with clean, renewable energy, Pleasanton can further reduce energy emissions right away by making homes and buildings more energy efficient. This strategy builds on the City’s progress to date in financing, outreach, and partnerships in support of energy efficiency and conservation. Energy efficiency

also has the added benefit of reducing energy bills for residents and businesses. These cost savings are particularly important for lower income residents and renters, who tend to face a disproportionately higher energy burden because they are more likely to live in older, less energy efficient homes and apartment complexes.

Strategy BE-3 Expand use of renewable energy. As the decarbonization strategy works to remove fossil fuel use from our buildings and the energy efficiency strategy works to reduce overall energy consumption, expanding the use of locally generated renewable energy will increase Pleasanton's general climate and energy resilience. The City will increase local renewable energy generation and storage to reduce reliance on the larger power grid and make the community less susceptible to potential energy shortages from climate impacts like heat waves. Expanding renewables and storage will increase community resilience during Power Safety Shut-off events and allow homes to maintain service during those times. The installation and maintenance of new solar technology will also support local green jobs.

Community Resilience and Wellbeing

Prepare for climate and non-climate emergencies and integrate climate considerations across City and community decision-making.

Strategy CRW-1 Improve community resilience and reduce vulnerability to climate change. In Pleasanton, we have experienced poor air quality due to wildfires, mandatory water usage cuts due to droughts, and increased temperatures. Access to programming that supports, educates, and improves the quality of life for the most vulnerable communities is essential to improve resilience and prepare communities for climate impacts. Existing programs encourage active lifestyles and green space, which enhance public health. To continue to support healthy communities, the City of Pleasanton will maintain current community resilience programs and dedicate resources to comprehensive climate awareness, education, and outreach, both of which are critical to understanding how to prepare for climate change and the consequences of inaction.

Natural Systems

Offset GHG emissions by fostering resilient natural landscapes that improve habitats, ecosystems, and public health.

Strategy NS-1 Increase and optimize carbon sequestration, improve ecosystem resilience. The GHG emissions reductions needed to achieve per capita carbon neutrality by 2045 are significant. Even with significant emissions reductions, carbon sequestration (i.e., storing carbon in soil, trees, and vegetation) is a critical piece of meeting the City's targets. Carbon sequestration can offset emissions that may persist and be challenging to remove (e.g., natural gas from industries that do not currently have alternative fuel options). The City maintains a significant amount of open and green spaces, including parks, medians, the golf course, and hillsides so this strategy represents a significant opportunity for Pleasanton to offset emissions. Successful

sequestration and ongoing sustainable land management will also restore and improve ecosystem resilience, alleviating the pressure and stress on Pleasanton's natural systems from global climate change and localized extreme heat, water shortages, pesticide use, and land development.

Water Resources

Reduce GHG emissions from water usage (including conveyance) and prepare community water resources for a changing climate which will result in cost savings, enhance water quality and availability, improve infrastructure, and increase resiliency.

Strategy WR-1 Improve water supply and increase conservation. Water is the foundation of life, and Pleasanton has already experienced mandated water cuts due to drought conditions. The City will continue to prioritize a sustainable, healthy water supply and storage, building on the success of existing programs such as the Controller Assistant Program and Water Conservation Program. Continued success in water efficiency and conservation also ensures enough water for natural systems, increasing both ecosystem and community resilience.

Strategy WR-2 Improve stormwater resilience. To maximize water reuse and efficiency, the City will increase stormwater infrastructure resilience to prepare for changes to flow and quality. By capturing stormwater, the City can both help to reduce flooding impacts of heavy rainfall periods and improve local water supplies. These benefits support community health, reduce water bills, may increase water availability for ecosystems, and may bring more green jobs to Pleasanton.

Materials and Consumption

Reduce GHG emissions from materials management and consumption which will support regional waste reduction efforts.

Strategy MC-1 Increase waste diversion and optimize collection and disposal systems. Waste collection and processing release a significant amount of methane gas, a greenhouse gas with a global warming potential 84 times greater than carbon dioxide. Diverting waste from the landfill and optimizing collection and disposal not only reduces processing emissions, it increases the supply of recycled and composted content available for a variety of uses and helps improve local air and soil quality.

Strategy MC-2 Enhance sustainable production and reduce consumption. Recognizing the significant GHG emissions from consumption must ultimately be reduced through consumer behavior change, efforts to reduce barriers to and incentivize sustainable consumption are essential to meaningful reductions in consumption-based emissions. Sustainable consumption can increase waste diversion, which supports local air and soil quality improvements. It also supports the local economy and can strengthen social ties and financial resilience as communities rely more on local businesses.

City of Pleasanton 2020 Urban Water Management Plan

The purpose of the 2020 Urban Water Management Plan (2020 UWMP) is to provide a planning tool for the City for developing and delivering municipal water supplies to the City's water service area. The 2020 UWMP provides the City with a water management action plan for guidance as water supply and demand conditions change. The 2020 UWMP also serves as a comprehensive guide for long-term water supply planning. The City developed the 2020 UWMP in coordination with Zone 7 and the public. While preparing the 2020 UWMP, the City notified other stakeholders (e.g., Alameda County, California Water Service [Cal Water], Livermore, Dublin San Ramon Services District [DSRSD]) of its preparation, its availability for review, and the public hearing prior to adoption. The 2020 UWMP includes water conservation measures, which would in turn reduce GHG emissions from water usage.

Pleasanton Municipal Code

The City's Municipal Code includes the following measures to improve air quality, reduce noise, reduce water usage and waste impacts, that also reduces GHG emissions.

9.04.100 Construction

Notwithstanding any other provision of this chapter, between the hours of 8:00 a.m. and 8:00 p.m. daily, except Sunday and holidays, when the exemption shall apply between 10:00 a.m. and 6:00 p.m., construction, alteration or repair activities which are authorized by a valid city permit shall be allowed.

9.20.080 Solid waste, recyclables and organic waste—Disposal and recycling.

- A. Unless otherwise provided in a collection contract entered into pursuant to Section 9.20.100 of this chapter, the solid waste, recyclables and organic waste collector shall dispose of, or recycle, as applicable, all solid waste, recyclables and organic waste outside of the city limits by fill and cover method in a place and manner that shall not be a nuisance to the inhabitants nearby, or reasonably objectionable to the City Council. The place and manner of such disposal or recycling must also have the approval of the County health officer, the State Board of Health, and other regulatory agency, as applicable.
- B. Organic waste may be fed to chickens and other animals on the premises where organic waste is produced, provided that said premises are always kept in a sanitary condition to the satisfaction of the City, and provided further, that the keeping and feeding of such chickens and animals shall at all times conform to the ordinances and regulations governing the same now in force in the City or which may hereafter be enacted.
- C. Food recovery, meaning actions to collect and distribute food for human consumption that otherwise would be disposed, or as otherwise defined in Title 14 California Code of Regulation Section 18982(a)(24), is allowed in compliance with State, County and local laws and regulations.
- D. All solid waste, recyclables and organic waste once collected shall become the property of the collector with a collection contract entered into pursuant to

Section 9.20.100 of this chapter unless otherwise specifically stated in a written agreement between such collector and the City. (Ordinance 2226 § 3, 2021; Prior Code § 4-4.11).

9.21.030 Waste management plan

- A. WMP Application. Each applicant of a regulated project shall submit an electronic WMP application through the City's designated online waste management and tracking system prior to beginning any project that requires a building, demolition, or similar construction permit. The completed WMP application shall include all of the following:
1. The address or location, building permit number(s) and description of the project.
 2. Project information, such as the job valuation, area of work, permit number, tract information (if known), project diversion rate and relevant personnel involved with this WMP.
 3. The estimated quantities of all materials to be salvaged, recycled and/or disposed.
 4. The hauling and disposal method.
 5. The facility or facilities being utilized for salvage, recycling or disposal of construction or demolition materials.
 6. The applicant shall certify their acknowledgment of, and agreement to comply with both the City's franchise collector requirements and hauling and self-hauling regulations. (Ordinance 2120 § 1, 2015; Ordinance 1992 § 1, 2009).

9.23 Organics Reduction and Recycling

As provided in Municipal Code 9.23.010, the purpose of this chapter is to comply with state laws to take measures to reduce the amount of organic and recyclable materials deposited in landfills from commercial and residential generators pursuant to SB 1383. It is also intended to streamline the reduction and recycling process for commercial and residential waste generators by opting into the countywide organics reduction and recycling Ordinance developed by the Alameda County waste management authority (Ordinance 2226 § 2 2021).

17.50 Green Building

As provided in Municipal Code 17.50.010, the purpose of this chapter is to enhance public welfare and assure that further residential, commercial, and civic development is consistent with the city's desire to create a more sustainable community by incorporating green building into the design, construction, and maintenance of buildings. The green building practices referenced in this chapter are design to achieve the following goals:

- A. To encourage resource conservation;

- B. To reduce the waste generated by construction projects;
- C. To increase energy efficiency; and
- D. To promote the health and productivity of residents, workers, and visitors to the city. (Ordinance 934 § 1 2006).

20.26.010 California Green Building Standards (CALGreen) Code adopted

There is adopted by reference that certain code known as the California Green Building Standards (CALGreen) Code at Title 24 California Code of Regulations Part 11 (2019 Edition), as more particularly described in this section, except such provisions that are amended, modified or deleted in this chapter, and the same is adopted and incorporated as fully as if set out in this chapter. A copy of said code is available for use by the public at the City of Pleasanton’s Building Division.

20.26.070 Section 5.408 amended—Construction waste reduction, disposal and recycling

5.408.1 Construction waste management. As provided in Municipal Code Chapter 9.21, “regulated projects” as defined therein shall comply with Municipal Code Chapter 9.21. All other projects that are not regulated by Municipal Code Chapter 9.21 subject to CALGreen requirements shall comply with CALGreen Section 4.408, as applicable.

5.408.3 Excavated soil and land clearing debris. 100 percent of trees, stumps, rocks, and associated vegetation and soils resulting primarily from land clearing shall be reused or recycled. For a phased project, such material may be stockpiled on-site until the storage site is developed.

Chapter 20.70 Expedited Permitting Process for Clean Energy Systems

20.70.010 Purpose. The purpose of this chapter is to provide an expedited solar permitting process that complies with the Solar Rights Act and AB 2188 (Chapter 521, Statutes 2014, California Government Code Section 65850.5), and AB 1236 for electric vehicle charging stations (Chapter 598, Statutes 2015, California Government Code Section 65850.7) and electric vehicle charging stations in order to achieve timely and cost-effective installations of small residential rooftop solar energy systems by removing unreasonable barriers and minimizing costs to property owners. This chapter allows the City to achieve these goals while protecting the public health and safety. (Ordinance 2166 § 2, 2017; Ordinance 2126 § 1, 2015).

3.7.4 - Project Impacts and Mitigation Measures

Significance Criteria

The City is using Appendix G of the State CEQA Guidelines as thresholds of significance for the Housing Element Update. To determine whether impacts related to GHG emissions would result in significant environmental effects, the following questions are analyzed and evaluated. Would the Housing Element Update:

- a) Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?
- b) Conflict with any applicable plan, policy or regulation of an agency adopted for the purpose of reducing the emissions of greenhouse gases?

The BAAQMD 2017 CEQA Air Quality Guidelines and recently updated 2022 GHG significance thresholds for land use development projects includes specific recommendations for evaluating plan-level projects, such as the Housing Element Update.⁴² The BAAQMD recommends that such plans are evaluated against whether they will be consistent with the State's long-term climate goal of achieving carbon neutrality by 2045. Per the BAAQMD 2022 GHG significance thresholds for land use development plans, if a land use development plan cannot demonstrate consistency with Criterion A or Criterion B below, that plan would result in a potentially significant impact related to GHG emissions:

- A. Meet the State's goals to reduce emissions to 40 percent below 1990 levels by 2030 and carbon neutrality by 2045; or
- B. Be consistent with a local GHG reduction strategy that meets the criteria under State CEQA Guidelines Section 15183.5(b).

The Housing Element Update is evaluated against these criteria in the following sections to determine its potential impacts.

Approach to Analysis

GHG Emissions Generation Calculation Methodology

The California Emissions Estimator Model (CalEEMod) Version 2020.4.0 was used to estimate the project's operation related GHG emissions, consistent with analysis contained in Section 3.2, Air Quality. CalEEMod was developed in cooperation with air districts throughout the State and is designed as a uniform platform for government agencies, land use planners, and environmental professionals to quantify potential GHG emissions associated with construction and operation from a variety of land uses.

Construction

Construction emissions can vary substantially from day to day, depending on the level of activity, the specific type of operation, and prevailing weather conditions. Construction emissions result from on-site and off-site activities. On-site GHG emissions principally consist of exhaust emissions from heavy-duty construction equipment. Off-site GHG emissions would occur from motor vehicle exhaust from material delivery vehicles and construction worker traffic.

The Housing Element Update does not propose any specific development project, and future developments consistent with the Housing Element Update would undergo individual review under CEQA. In general, construction activities that may be associated with future developments consistent

⁴² Bay Area Air Quality Management District (BAAQMD). 2022. Justification Report: CEQA Thresholds for Evaluating the Significance of Climate Impacts from Land Use Projects and Plans. April.

with the Housing Element Update would consist of demolition, mass grading, building construction, asphalt paving of roadways, and architectural coating of the inside and outside of the buildings. Development consistent with the Housing Element Update is anticipated to begin in year 2023, with an estimated date of full buildout of 2031. It is too speculative at this time to calculate GHG emissions associated with construction activities because the details regarding future construction activities are not known, including phasing, construction duration, and construction equipment. As noted above, subsequent environmental review of future development projects would be required to assess potential construction-related energy consumption impacts.

Operation

Operational GHG emissions are those GHG emissions that would occur during long-term operation of the project. Project operations were modeled for year 2031, when it is anticipated development consistent with the Housing Element Update would be fully built out. The major sources for operational GHG emissions are summarized below.

Motor Vehicles

Mobile source emissions refer to exhaust and road dust emissions generated from the motor vehicle traffic that would be facilitated by development consistent with the Housing Element Update. Fehr & Peers prepared a Transportation Assessment for the Housing Element Update,⁴³ which forms the basis for values altered in CalEEMod to estimate project-generated mobile source emissions. These mobile source emissions values can be found in Appendix C.

Natural Gas

These emissions refer to the GHG emissions that occur when natural gas is burned on a site. Natural gas uses accounted for in the modeling include space and water heating and natural gas-fired appliance use.

Indirect GHG Emissions

For GHG emissions, CalEEMod contains calculations to estimate indirect GHG emissions. Indirect emissions are emissions where the location of consumption or activity is different from where the actual emissions are generated. For example, electricity would be consumed at the potential sites for housing; however, the emissions associated with producing that electricity are generated off-site at a power plant.

CalEEMod includes calculations for indirect GHG emissions for electricity consumption, water consumption, and solid waste disposal. For water consumption, CalEEMod calculates the embedded energy (e.g., treatment, conveyance, and distribution) associated with providing each gallon of potable water to a site. For solid waste disposal, CalEEMod calculates the GHG emissions generated as solid waste generated by a project decomposes in a landfill.

For electricity-related emissions, CalEEMod contains default electricity intensity factors for various utilities throughout California. For the purposes of this analysis, emission factors for Pacific Gas and Electric Company (PG&E) were selected to quantify electricity emissions. The Housing Element Update would become incrementally operational starting in the year 2023; however, to provide a

⁴³ Fehr & Peers. 2022. Pleasanton Housing Element – Transportation Assessment.

conservative analysis, full operation of the development consistent with the Housing Element Update was modeled to occur in 2031. Although intensity factors may be lower in 2030 and beyond due to the implementation of State policy goals and regulations promoting the use of renewable energy by service providers, to provide a conservative analysis, CalEEMod default electricity intensity factors were used in the modeling presented in this analysis.

- **Carbon dioxide:** 203.98 pounds per megawatt-hour (lbs/MWh)
- **Methane:** 0.033 lbs/MWh
- **Nitrous oxide:** 0.004 lbs/MWh

Refrigerants

During operation, there may be leakage of refrigerants from air conditioners and the refrigeration system. HFCs are typically used for refrigerants, which are long-lived GHGs. Residential uses of refrigerants are minor; therefore, they were not estimated.

Lifecycle Emissions

An upstream GHG emissions source (also known as lifecycle emissions) refers to emissions that are generated during the manufacturing and transportation of products that would be utilized for project construction. Upstream emission sources for construction of the project include but are not limited to GHG emissions from the manufacturing of cement and steel as well as from the transportation of building materials to the seller of such products. The upstream emissions associated with construction of the project has not been estimated as part of this impact analysis, because such upstream emissions are not within the control of the project, the information is not readily available, and to characterize these emissions would be speculative. Additionally, the California Air Pollution Control Officers Association (CAPCOA) White Paper on CEQA and Climate Change supports this approach by stating, “The full lifecycle of GHG emissions from construction activities is not accounted for . . . and the information needed to characterize [lifecycle emissions] would be speculative at the CEQA analysis level.”⁴⁴ Therefore, pursuant to State CEQA Guidelines Sections 15144 and 15145, upstream/life cycle emissions are speculative, and is not further discussed as part of this impact analysis.

Impact Analysis

Greenhouse Gas Emissions Generation and Conflict with Plan, Policy, or Regulation that Reduces Emissions

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- | | |
|----------------------|--|
| Impact GHG-1: | Development facilitated by the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment. |
| Impact GHG-2: | Development facilitated by the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not conflict with any applicable plan, policy or regulation of an agency adopted for the purpose of reducing the emissions of greenhouse gases. |
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⁴⁴ California Air Pollution Control Officers Association (CAPCOA). 2008. CEQA and Climate Change, Evaluating and Addressing Greenhouse Gas Emissions from Projects Subject to California Environmental Quality Act (CEQA). June.

Both construction and operation activities have the potential to generate GHG emissions. Development consistent with the Housing Element Update would generate GHG emissions during temporary (short-term) construction activities such as site grading, operation of construction equipment, operation of on-site heavy-duty construction vehicles, hauling of materials to and from the future project sites, asphalt paving, and construction worker vehicle trips. On-site construction activities would vary depending on the level of construction activity.

Long-term operational GHG emissions would result from project-generated vehicular traffic, utilization of any landscaping equipment, off-site generation of electrical power, use of energy required to convey water to and wastewater to the potential sites for housing, hauling and disposal of solid waste from the potential sites for housing, any fugitive refrigerants from air conditioning or refrigerators, and operation of any proposed stationary sources such as backup generators or fire pumps.

Global climate change is not confined to a particular project area and is generally accepted as the consequence of global industrialization over the last 200 years. A typical project, even a very large one, does not generate enough GHG emissions on its own to influence global climate change significantly; hence, the issue of global climate change is, by definition, a cumulative environmental impact. Therefore, this section measures the Housing Element Update's incremental contribution to the cumulative environmental impact.

As previously discussed, the BAAQMD's 2022 GHG significance thresholds state that a land use development plan, such as the Housing Element Update, has the potential to result in a significant impact if it cannot demonstrate consistency with Criterion A or Criterion B:

- A. Meet the State's goals to reduce emissions to 40 percent below 1990 levels by 2030 and carbon neutrality by 2045; or
- B. Be consistent with a local GHG reduction strategy that meets the criteria under State CEQA Guidelines Section 15183.5(b).

As previously discussed, the CAP 2.0 is considered a qualified reduction strategy pursuant to State CEQA Guidelines Section 15183.5(b). Therefore, the Housing Element Update is analyzed herein under the BAAQMD's Criterion B, which allows for plan-level projects to be evaluated for consistency against a qualified GHG reduction strategy to determine the potential significance of a proposed plan. Considering that the CAP 2.0 is the applicable plan adopted for the purposes of reducing GHG emissions, this analysis combines Impacts GHG-1 and GHG-2 and assesses the Housing Element Update's consistency with the CAP 2.0 to determine impact significance. By demonstrating that the Housing Element Update is consistent with the goals and policies of the CAP 2.0, this analysis also demonstrates that the Housing Element Update would support the State's goals to reduce emissions by 40 percent below 1990 levels by 2030 and to achieve carbon neutrality by 2045, since the CAP 2.0 was adopted to support the achievement of those goals.

Construction activities associated with development consistent with the Housing Element Update would generate temporary short-term GHG emissions from heavy-duty construction equipment,

worker trips, and material delivery and hauling. On-site activities would consist of the operation of off-road construction equipment, as well as on-site truck travel (e.g., haul trucks, dump trucks, and concrete trucks). Off-site sources would include emissions from construction vehicles used for hauling materials and worker vehicle trips. It should be noted that although the Housing Element Update provides policies and programs to facilitate new housing construction, the Housing Element Update does not propose any specific development projects, nor is the City required to construct any particular project. Therefore, construction emissions were not quantified as that analysis would be too speculative in nature. Moreover, the BAAQMD has not established thresholds of significance for GHG emissions resulting from construction activities at the plan level. Rather, the BAAQMD encourages the incorporation of Best Management Practices (BMPs) to reduce GHG emissions during construction. The BMPs recommended by the BAAQMD to reduce construction-related GHG emissions include maximizing the use of alternative fueled construction vehicles and equipment and local building materials as well as recycling or reusing construction and demolition waste to the maximum extent practicable.

The General Plan and Municipal Code include policies and programs specifically designed to address GHG emissions during project construction activities. The General Plan includes GHG reduction strategies for developments approved prior to the adoption of the CAP 2.0 and required the adoption of the CAP 2.0. Municipal Code Section 9.20.080 supports reducing and recycling solid waste, recyclables, and organic waste. Municipal Code Section 9.21.030 includes development of waste management plans to divert construction waste from landfill. Recovering salvageable materials for recycling would lead to further reductions of GHG emissions.

Future development projects where the City is the lead agency would need to show consistency with the BAAQMD's 2022 GHG significance thresholds for land use development projects or incorporate mitigation to reduce impacts to less than significant levels. Additionally, the City requires that development projects demonstrate consistency with the CAP 2.0 by submitting the CAP 2.0 CEQA GHG Emissions Analysis Compliance Checklist to ensure projects comply with the GHG reduction strategies outlined in the CAP 2.0. For land use development projects, the BAAQMD recommends that the project demonstrate conformity with Criterion A or Criterion B to demonstrate less than significant impacts:

- A. Projects must include, at a minimum, the following project design elements.
 - a. Buildings:
 - i. The project will not include natural gas appliances or natural gas plumbing (in both residential and nonresidential development).
 - ii. The project will not result in any wasteful, inefficient, or unnecessary energy usage as determined by the analysis required under CEQA Section 21100(b)(3) and Section 15126.2(b) of the State CEQA Guidelines.
 - b. Transportation:
 - i. Achieve compliance with EV requirements in the most recently adopted version of CALGreen Tier 2.
 - ii. Achieve a reduction in project-generated VMT below the regional average consistent with the current version of the California Climate Change Scoping Plan (currently 15 percent) or meet a locally adopted SB 743 VMT target, reflecting the

recommendations provided in the Governor's Office of Planning and Research's Technical Advisory on Evaluating Transportation Impacts in CEQA:

1. Residential projects: 15 percent below the existing VMT per capita.
2. Office projects: 15 percent below the existing VMT per employee.
3. Retail projects: no net increase in existing VMT.

- B. Projects must be consistent with a local GHG reduction strategy that meets the criteria under State CEQA Guidelines Section 15183.5(b).

An individual land use development project must demonstrate consistency with either Criterion A or Criterion B of the above significance thresholds to have less than significant impacts. Therefore, future individual development projects consistent with the Housing Element Update would need to demonstrate consistency with the BAAQMD's recommended significance threshold Criterion A or, if they cannot demonstrate consistency with BAAQMD's recommended thresholds, demonstrate consistency with the CAP 2.0 (the local GHG reduction strategy) by completing and submitting the CAP 2.0 CEQA GHG Emissions Analysis Compliance Checklist.

The operational GHG emissions from buildout of the Housing Element Update have been calculated through use of the CalEEMod model (see Appendix C). The operational GHG emissions are based on the full buildout in 2031, which assumes a maximum of 7,787 dwelling units. As discussed in Section 2, Project Description, the Housing Element Update could result in a maximum of 18,029 new residents. The GHG emissions forecast assumes that several State and local GHG reduction measures will be implemented by 2031, to the extent that subsequent emissions reductions can be reasonably quantified for the Housing Element Update, including the following actions:

- Implementation of the Renewable Portfolio Standard, which requires electricity providers to increase the portion of energy that comes from renewable sources to 60 percent by 2030 and zero-carbon by 2045;
- Implementation of the most current Title 24 building energy use standards;
- Reduction of indoor residential and indoor/outdoor commercial lighting energy usage as detailed in AB 1109;
- Implementation of California Advanced Clean Car, including Pavley standards and Executive Order N-79-20 that requires 100 percent of new passenger vehicles sold in California to be zero-emissions by 2035;
- Adoption of Complete Streets standards to expand pedestrian and bicycle infrastructure; and
- Improvements to public transit and ridesharing programs.

To provide a conservative analysis, Table 3.7-2 shows the GHG emissions generated from operation of the 7,787 new dwelling units. It should be noted that the emission estimates in Table 3.7-2 are principally based on compliance with current standards and regulations. Future State regulations, including SB 100, requiring 100 percent of retail sales of electricity to be generated from zero-carbon emissions sources by 2045, will result in emissions reductions greater than what is considered in the emission estimates contained in Table 3.7-2. In addition, the mobile source emission estimates

cannot reasonably quantify reductions that would be seen from the implementation of Executive Order N-79-20, which will require 100 percent of new passenger vehicles sold in California to be zero-emissions by 2035, due to the unknown level of EV use in the city following that action. Moreover, the GHG emission reduction policies and programs in the General Plan and CAP 2.0 would further reduce the GHG emissions shown in Table 3.7-2. As future developments consistent with the Housing Element Update are not yet defined, it would be speculative to quantify potential emission reductions achieved through compliance with the GHG reduction strategies included in the CAP 2.0 at this time; those emission reductions have not been included as a part of this analysis.

As shown in Table 3.7-2, the citywide GHG emissions per service population are projected to be 3.2 MT CO₂e in 2031 with implementation of development consistent with the Housing Element Update. As previously stated, the CAP 2.0 establishes a per capita emissions target of 4.1 MT CO₂e per capita per year in 2030 for citywide activities, which would include residential uses. Because project-specific details are unknown at this time that could support a consistency analysis with the CAP 2.0 CEQA GHG Emissions Analysis Compliance Checklist, per capita emissions are compared against the CAP 2.0 emissions reduction target of 4.1 MT CO₂e per capita per year to demonstrate consistency with the CAP 2.0, consistent with BAAQMD guidelines. A general consistency analysis of the Housing Element Update with the goals and policies of the CAP 2.0 is also provided. Development consistent with the Housing Element Update is anticipated to result in 3.2 MT CO₂e per capita per year, which would not exceed the City's reduction goal of meeting 4.1 MT CO₂e per capita per year by 2030. As such, the Housing Element Update would be considered consistent with the CAP 2.0 for purposes of a tiered analysis under State CEQA Guidelines Section 15183.5(b).

Table 3.7-2: Operational GHG Emissions at Buildout (2031) of Housing Element Update

Source Category	Emissions at Buildout (2031) (MT CO ₂ e per year)
Area Sources	252
Energy Usage	8,389
Transportation	45,682
Solid Waste	2,184
Water and Wastewater	1,039
Annual Total	57,547
Service Population (Population + Jobs)	18,029 persons
Emissions Per Service Population	3.2
Threshold (MT CO₂e per capita)	4.1
Threshold Exceeded?	No
Notes: MT CO ₂ e = metric tons of carbon dioxide equivalent Source: CalEEMod Version 2020.4.0 (see Appendix C).	

As previously stated, the Housing Element Update would be consistent with the GHG emissions reduction goal established by the CAP 2.0; however, for the Housing Element Update to be considered consistent with the applicable plan adopted for the purpose of reducing GHG emissions—the CAP 2.0—the Housing Element Update must also demonstrate consistency with the strategies of the CAP 2.0, as applicable. Table 3.7-3 below identifies CAP 2.0 strategies and provides a consistency analysis for the Housing Element Update.

Table 3.7-3: Consistency with CAP 2.0

CAP 2.0 Strategy	Consistent with Control Measure?	Discussion
<p>Buildings and Energy (BE) Strategy BE-1. Advance the decarbonization of buildings.</p> <p>Strategy BE-2. Improve energy consumption and efficiency.</p> <p>Strategy BE-3. Expand use of renewable energy.</p>	<p>Yes</p>	<p>Development consistent with the Housing Element Update would be required to comply with the California Building Code Title 24 Energy Efficiency Standards, which in most cases would require new low-rise residential construction to include rooftop solar and establish a net zero energy budget. Municipal Code Chapter 17.50 requires the inclusion of green buildings practices in the design, construction, and maintenance of buildings. Additionally, Housing Element Update policies and programs, including Policy 6.4 and Programs 6.2 and 6.5, support energy conservation, expanded use of renewable energy, and sustainable building design.</p> <p>Through compliance with the CAP 2.0 checklist requirements, confirmed during the permitting process, developments consistent with the Housing Element Update would incorporate new energy efficient technologies and methods to improve energy efficiency and reduce energy consumption.</p>
<p>Transportation and Land Use (TLU) Strategy TLU-1: Advance vehicle decarbonization.</p> <p>Strategy TLU-2: Advance active, shared, and public transportation. Support the Valley Link project and implement the City’s Trail Master Plan, Bicycle and Pedestrian Master Plan, and Complete Streets program.</p> <p>Strategy TLU-3: Advance sustainable land use. Support not only responsible community development, but reduce VMT and provide access to active and/or shared transportation.</p>	<p>Yes</p>	<p>The City has adopted the CALGreen Code and future development projects consistent with the Housing Element Update would be required to comply with the CALGreen Code that requires Electric Vehicle and Clean Air Vehicle facilities and infrastructure as well as bicycle parking spaces, which would potentially promote vehicle decarbonization and active transportation.</p> <p>Multiple Housing Element Update programs and policies promote transit-oriented development, which supports the advancement of alternative modes of transportation consistent with CAP 2.0 strategies. These include Policies 6.1, 6.3, and 6.5, as well as Programs 6.2 and 6.4.</p> <p>In addition, Livermore Amador Valley Transit Authority (LAVTA) and Bay Area Rapid Transit (BART)</p>

CAP 2.0 Strategy	Consistent with Control Measure?	Discussion
		connect the city and job centers. The West Dublin-Pleasanton BART station is within 500 feet of Site 2 (Stoneridge Shopping Center, Mall), and one station at the Dublin-Pleasanton BART Station (east) within 1 mile of Sites 4 (Owens, Motel 6 and Tommy T), 5 (Laborer Council), 6 (Signature Center), 7 (Hacienda Center), 9 (Metro 580), 11 (Old Santa Rita Area), and 29 (Oracle). Therefore, the Housing Element Update would promote shared and public transportation modes and sustainable communities.
<p>Materials and Consumption Strategy MC-1: Increase waste diversion and optimize collection and disposal systems.</p> <p>Strategy MC-2: Enhance sustainable production and reduce consumption.</p>	Yes	The City has adopted the CALGreen Code and development consistent with the Housing Element Update would be required to comply with the CALGreen Code that requires developments to provide readily accessible areas that serve the entire building that are identified for the depositing, storage and collection of nonhazardous materials for recycling. Municipal Code Chapter 9.20 regulates disposal of solid waste, including regulations related to food recovery in an effort to reduce food waste. Municipal Code Chapter 9.23 includes measures to reduce the amount of organic and recyclable materials deposited in landfills from commercial and residential generators. In addition, the CALGreen Code also requires minimum 65 percent diversion of construction and demolition waste from landfills. Municipal Code Chapter 9.21 requires builders to prepare a waste management plan, including the estimated quantity of materials to be salvaged and recycled, which ensures compliance with the CALGreen Code. Furthermore, Housing Element Update policies and programs directly support waste diversion efforts and CAP 2.0 strategies to reduce consumption, including Programs 6.2, 6.5, and 6.6.
<p>Natural Systems Strategy NS-1: Increase and optimize carbon sequestration, improve ecosystem resilience.</p>	Yes	All future development consistent with the Housing Element Update would be required to undergo the design review process, which would evaluate the layout, landscaping, parking, architecture, and other aspects of future development projects against the CAP 2.0 measures that support increased carbon sequestration and improved ecosystem resilience. Housing Element goals, policies, and programs such as Goal 6 and Policies 6.3 and 6.4 support reducing the environmental impact of future developments and promoting infill development.
<p>Water Resources Strategy WR-1. Improve water supply and increase conservation.</p>	Yes	The City has adopted CALGreen Code and development consistent with the Housing Element Update would comply with the CALGreen Code that

CAP 2.0 Strategy	Consistent with Control Measure?	Discussion
		requires water use savings such as a 20 percent mandatory reduction in indoor water use. Additionally, the 2020 UWMP includes water conservation measures, which would reduce water usage from development consistent with the Housing Element Update. Housing Element Update Policy 6.4, and Programs 4.4, 6.2, 6.3, 6.5, and 6.6 address improving water supply to the city and promoting conservation, consistent with the CAP 2.0 goals and strategies.

As demonstrated in Table 3.7-3 development consistent with the Housing Element Update would be consistent with the applicable measures and actions of the CAP 2.0. To ensure that future development projects consistent with the Housing Element Update would be consistent with the CAP 2.0, these projects would be required to individually demonstrate consistency with the CAP 2.0 as a part of the City’s permitting process. Moreover, as shown in Table 3.7-2, the emissions anticipated to be generated by development consistent with the Housing Element Update would support the City’s GHG reduction goals outlined in the CAP 2.0. As such, development consistent with the Housing Element Update would be considered consistent with the CAP 2.0 for purposes of analysis under the BAAQMD Thresholds of Significance. This impact would be less than significant.

Level of Significance

Less than significant impact.

3.7.5 - Cumulative Impacts

As described above, GHG emissions related to implementation of the Housing Element Update are not confined to a particular air basin but are dispersed worldwide and GHG emissions are widely acknowledged as a significant cumulative impact. Therefore, the GHG analysis provided above also addresses cumulative impacts.

All cumulative projects would be required to comply with City ordinances, General Plan policies, and CAP 2.0 measures, as appropriate, to reduce GHG emissions. Cumulative projects would also be required to comply with existing federal, State, and local regulations and policies to reduce communitywide GHG emissions. Finally, cumulative projects would be required to comply with the requirements of CEQA and obtain all necessary clearances and permits. For these reasons, cumulative impacts related to GHG emissions would be less than significant.

As discussed above, the Housing Element Update allows for future residential growth and development in the city. The Housing Element Update would not directly result in development without additional approvals. Before any development can occur in the city, it would be required to be analyzed for consistency with the General Plan, zoning requirements, and other applicable local and State requirements; comply with the requirements of CEQA; and obtain all necessary clearances

and permits. Furthermore, existing federal, State, and local regulations and policies described throughout this section that serve to reduce communitywide GHG emissions would apply to future projects. Continued compliance with these regulations and implementation of applicable mitigation measures would ensure the Housing Element Update's contribution to this impact would not be cumulatively considerable.

As previously discussed, the development consistent with the Housing Element Update is anticipated to result in a per capita GHG emissions under buildout conditions in 2031 of 3.2 MT CO₂e, which is below the CAP 2.0 GHG reduction goal of 4.1 MT CO₂e per capita per year.

For the reasons described above, the Housing Element Update, in conjunction with other planned and approved projects, would result in a less than significant cumulative impact with respect to GHG emissions.

Level of Cumulative

Less than significant impact.

3.8 - Hazards and Hazardous Materials

3.8.1 - Introduction

This section of the Draft Program Environmental Impact Report (Draft Program EIR) analyzes impacts associated with exposure to hazards and hazardous materials within the potential sites for rezoning resulting from implementation of the proposed 2023-2031 (6th Cycle) Housing Element Update, rezonings, General Plan, and Specific Plan Amendments (collectively referred to herein as the Housing Element Update). Specifically, the analysis addresses impacts related to hazardous materials use and transportation, accidental release of hazardous materials, new development or redevelopment on contaminated sites, air traffic hazards, and interference with emergency response and evacuation plans. Future projects consistent with the Housing Element Update will be evaluated for project-specific impacts with respect to hazards and hazardous materials at the time they are proposed.

Once the Housing Element Update is adopted, the General Plan would be amended to include the Housing Element Update. Therefore, all references to the General Plan include the Housing Element Update.

3.8.2 - Environmental Setting

Fundamentals

Hazards

This description of existing conditions focuses on hazards from hazardous materials and wastes as well as fire and overhead power lines. A hazard is a situation that poses a level of threat to life, health, property, or the environment. Hazards can be dormant or potential, with only a theoretical risk of harm. However, once a hazard becomes active, it can create an emergency. A hazardous situation that has already occurred is called an incident. Emergency response is action taken in response to an unexpected and dangerous occurrence in an attempt to mitigate its impact on people, structures, or the environment. Emergency situations can range from natural disasters to hazardous materials problems and transportation incidents.

Hazards Materials and Wastes

Hazardous Materials

Hazardous materials include, but are not limited to, hazardous materials, hazardous substances, and hazardous wastes, as defined in Section 25501 and Section 25117 of the California Health and Safety Code. A hazardous material is any material that, because of its quantity, concentration, or physical or chemical characteristics, poses a significant present or potential hazard to human health and safety or to the environment if released; this includes any material that a handler or an administering regulatory agency under Section 25501 has a reasonable basis for believing would be injurious to the health and safety of persons or harmful to the environment. Various properties may cause a substance to be considered hazardous, including:

- Toxicity—causes human health effects;
- Ignitability—has the ability to burn;

- Corrosivity—causes severe burns or damage to materials; and
- Reactivity—causes explosions or generates toxic gases.

Hazardous Waste

Hazardous waste is any hazardous material that is to be discarded, abandoned, or recycled. The criteria that define a material as hazardous also define a waste as hazardous. Specifically, materials and waste may be considered hazardous if they are poisonous (toxic); can be ignited by open flame (ignitable); corrode other materials (corrosive); or react violently, explode, or generate vapors when mixed with water (reactive). Soil or groundwater contaminated with hazardous materials above specified regulatory State or federal thresholds is considered hazardous waste if it is removed from a site for disposal. If handled, disposed, or otherwise handled improperly, hazardous materials and hazardous waste can result in public health hazards if released into the soil or groundwater or through airborne releases in vapors, fumes, or dust. Soil and groundwater having concentrations of hazardous constituents higher than specific regulatory levels must be handled and disposed of as hazardous waste when excavated or pumped from an aquifer. The California Code of Regulations, Title 22, Sections 66261.20-24 contains technical descriptions of toxic characteristics that could cause soil or groundwater to be classified as hazardous waste.

Hazardous Building Materials

Many older buildings contain building materials that consist of hazardous materials. These materials include lead-based paint (LBP), asbestos-containing material (ACM), and polychlorinated biphenyls (PCBs).

Prior to the United States Environmental Protection Agency (EPA) ban in 1978, LBP was commonly used on interior and exterior surfaces of buildings. Disturbances such as sanding and scraping activities, renovation work, gradual wear and tear, old peeling paint, and paint dust particulates have been found to contaminate surface soils or cause lead dust to migrate and affect indoor air quality. Exposure to residual lead can cause severe health effects, especially in children.

Asbestos is a naturally occurring fibrous material that was extensively used as a fireproofing and insulating agent in building construction materials before such uses were banned by the EPA in the 1970s. In addition, many types of electrical equipment contained PCBs as an insulator, including transformers and capacitors. After PCBs were determined to be a carcinogen in the mid to late 1970s, the EPA banned PCB use in new equipment and began a program to phase out certain existing PCB-containing equipment. For example, fluorescent lighting ballasts manufactured after January 1, 1978, do not contain PCBs and are required to have a label clearly stating that PCBs are not present in the unit.

Hazardous Substances

A hazardous substance can be any biological, natural, or chemical substance, whether solid, liquid, or gas, that may cause harm to human health. Hazardous substances are classified on the basis of their potential health effects, whether acute (immediate) or chronic (long-term). Dangerous goods are classified on the basis of immediate physical or chemical effects, such as fire, explosion, corrosion, and poisoning. An accident involving dangerous goods could seriously harm human health or

damage property or the environment. Harm to human health may happen suddenly (acute), such as dizziness, nausea, and itchy eyes or skin; or it may happen gradually over years (chronic), such as dermatitis or cancer. Some people can be more susceptible than others. Hazardous substances and dangerous goods can include antiseptic used for a cut, paint for walls, a cleaning product for the bathroom, chlorine in a pool, carbon monoxide from a motor vehicle, fumes from welding, vapors from adhesives, or dust from cement, stone, or rubber operations. Such hazardous substances can make humans very sick if they are not used properly.

Hazardous Materials Use and Transport

The most common industrial hazardous wastes in the City of Pleasanton (City) are generated from gasoline service stations, dry cleaners, automotive mechanics, auto body repair shops, machine shops, printers, and photo processing facilities which could be located adjacent to land that could be developed for residential uses under the Housing Element Update on the potential sites for rezoning. Most of the wastes produced from these facilities and operations are petroleum hydrocarbon-based but also can include solvents and heavy metals. In addition, medical wastes, defined as potentially infectious waste from sources such as laboratories, clinics, and hospitals, are among the hazardous wastes produced in the city.

Along with the hazards of exposure and accidental release of stored hazardous materials, there are hazards associated with the transport of chemicals into and through an area. Most hazardous materials are regularly carried on freeways and major roads that are regulated by the California Department of Transportation (Caltrans) and the California Highway Patrol (CHP). The Union Pacific/Southern Pacific and Western Pacific Railroads, which operate in the city, carry cargoes that include hazardous materials and wastes. Pipelines used to carry fuels are also located within the city.¹

Environmental Database Review

The Cortese List is a list of known hazardous materials or hazardous waste facilities that meet one or more of the provisions of Government Code Section 65962.5, including:

- The list of hazardous waste and substances sites from the California Department of Toxic Substances Control (DTSC) EnviroStor database.²
- The list of leaking underground storage tank (LUST) sites by county from the California State Water Resources Control Board (State Water Board) GeoTracker database.³

¹ City of Pleasanton. 2011. City of Pleasanton Housing Element and Climate Action Plan General Plan Amendment and Rezonings Draft Supplemental EIR. September.

² California Department of Toxic Substances Control (DTSC). 2022. Hazardous Waste and Substances Site List (Cortese). Website: https://www.envirostor.dtsc.ca.gov/public/search?cmd=search&reporttype=CORTESE&site_type=CSITES,FUDS&status=ACT,BKLG,COM&reporttitle=HAZARDOUS+WASTE+AND+SUBSTANCES+SITE+LIST+%28CORTESE%29. Accessed February 9, 2022.

³ California State Water Resources Control Board (State Water Board). 2022. "Cortese" List of Leaking Underground Storage Tank Sites by County (Alameda County). Website: <https://geotracker.waterboards.ca.gov/search?cmd=search&hidept=True&status=&reporttitle=Alameda+County&county=Alameda&excludenc=True>. Accessed February 9, 2022.

- The list of solid waste disposal sites identified by the State Water Board with waste constituents exceeding hazardous waste levels outside the waste management unit.⁴
- The list of active Cease and Desist Orders and Cleanup Abatement Orders from the State Water Board.⁵
- The list of hazardous waste facilities subject to corrective action pursuant to Section 25187.5 of the Health and Safety Code, as identified by the DTSC.⁶

These databases were reviewed to identify relevant hazardous materials and hazardous waste sites in the vicinity of the potential sites for rezoning. Identified hazardous materials conditions include the presence or likely presence of any hazardous substance or petroleum products within 0.5 miles of the potential sites for rezoning. Several sites were identified and are provided in Table 3.8-1 and depicted on Exhibit 3.8-1a (Envirostor DTSC) and Exhibit 3.8-1b (Geotracker). This search meets the requirements of the EPA’s Standards and Practices for all Appropriate Inquiries (40 Code of Federal Regulations Part 312).

Table 3.8-1: Properties in the Vicinity of and Within the Potential Sites for Rezoning on the Cortese List

Name	Address	Distance to Site ¹	Contaminant	Order/Case Number	Cleanup Status
Envirostor					
Gelman Sciences	7079 Commerce Circle, Pleasanton, CA	0.40 mile east of Site 2	Unknown	71002728	Inactive-Needs Evaluation
Nucleport Corporation	7035 Commerce Circle, Pleasanton, CA	0.50 mile east of Site 2	Halogenated Solvents, Hydrocarbon Solvents	01350112	Refer: RWQCB
Costar Corporation	7035 Commerce Circle, Pleasanton, CA	0.50 mile east of Site 2	Unknown	71002732	Refer: Local Agency
The Clorox Technical Center	7200 Johnson Drive, Pleasanton, CA	0.40 mile east of Site 2	Unknown	71002553	No Further Action

⁴ California Environmental Protection Agency (Cal/EPA). 2022. Sites Identified with Constituents Above Hazardous Waste Levels Outside the Waste Management Unit. Website: <https://calepa.ca.gov/wp-content/uploads/sites/6/2016/10/SiteCleanup-CorteseList-CurrentList.pdf>. Accessed February 9, 2022.

⁵ California Environmental Protection Agency (Cal/EPA). 2022. List of “Active” State Water Board sites with active Cease and Desist Orders or Cleanup Abatement Orders. Website: <https://calepa.ca.gov/sitecleanup/corteselist/>. Accessed February 9, 2022.

⁶ California Environmental Protection Agency (Cal/EPA). 2022. List of sites subject to Corrective Action pursuant to Health and Safety Code 25187.5. Website: <https://calepa.ca.gov/sitecleanup/corteselist/section-65962-5a/>.

Name	Address	Distance to Site ¹	Contaminant	Order/Case Number	Cleanup Status
Parks Air Force Base	Dublin, CA	0.20 mile north of Site 29	Metals, Petroleum, Polynuclear Aromatic, Hydrocarbons, Volatile Organics	80000158	Active
Dublin Former Incineration/ Burn Dump Area	Hacienda Drive and Martinelli Drive, Dublin, CA	0.3 mile northwest of Site 9	Lead	70000157	No Further Action
Ponderosa Homes	4131 Foothill Road, Pleasanton, CA	At Site 22	1,1,1– Trichloroethane, Benzene, Chlordane	60000786	Inactive– Needs Evaluation
Applied Biosystems	6001 Sunol Boulevard, Pleasanton, CA	0.02 mile south of Sites 23 and 24	Polychlorinated Biphenyls (PCBS), TPH-Motor Oil, TPH-Diesel, Tetrachloroethylene (PCE)	01280050	Certified/ Operation and Maintenance
Brian Lin Property/ Joshua Neal Elementary School	3100 Vineyard Avenue, Pleasanton, CA	Within Site 27	No Contaminants Found	01010006	No Action Required
Geotracker					
Henry Moller and Sons Meat	5710 Foothill Pleasanton, CA	0.3 mile south of Site 2	Gasoline	T0600100933	Completed- Case Closed
Tri-Valley Herald	7132 Johnson Pleasanton, CA	0.3 mile east of Site 2	Gasoline	T0600101908	Completed- Case Closed
Former Clorox Campus–Building 9	7035 Commerce Circle, Pleasanton, CA	0.4 mile east of Site 2	Freon, Tetrachloroethylene (PCE), Trichloroethylene (TCE)	T0600191468	Completed- Case Closed
Former Clorox Campus-Building 7	7164 Johnson Drive, Pleasanton, CA	0.3 mile east of Site 2	Tetrachloroethylene (PCE)	T10000007118	Open–Site Assessment
Former Clorox Site	7200-7208 Johnson Drive, Pleasanton, CA	0.3 mile east of Site 2	Acetone, Dichloroethene (DCE), Diesel, Freon, Other Chlorinated Hydrocarbons, Other Solvent or Non-Petroleum Hydrocarbon, Tetrachloroethylene (PCE),	T10000005195	Completed- Case Closed

Name	Address	Distance to Site ¹	Contaminant	Order/Case Number	Cleanup Status
			Trichloroethylene (TCE)		
Valley Crest Landscaping	7043 Commerce, Pleasanton, CA	0.5 mile east of Site 2	Gasoline	T0600101966	Completed-Case Closed
Pacific Bell	7240 Johnson, Pleasanton, CA	0.4 mile east of Site 2	Gasoline	T0600101943	Completed-Case Closed
Clorox	7200 Johnson, Pleasanton, CA	0.3 mile east of Site 2	Waste Oil, Motor, Hydraulic, Lubricating	SLT19726987	Completed-Case Closed
Clorox Services Company	7280 Johnson, Pleasanton, CA	0.3 mile east of Site 2	Diesel	T0600100447	Completed-Case Closed
SBC Facility Pe171	7240 Johnson, Pleasanton, CA	0.3 mile east of Site 2	Gasoline	T0600184737	Completed-Case Closed
Associated Gasoline/City of Dublin	11759 Dublin Boulevard, Dublin, CA	0.5 mile northwest of Site 2	Diesel, Gasoline, Lead, Waste Oil/Motor/Hydraulic/Lubricating	T10000001168	Completed-Case Closed
Shell #13-5243	11989 Dublin, Dublin, CA	0.4 mile north of Site 2	Gasoline	T0600102083	Completed-Case Closed
Unocal #5901	11976 Dublin, Dublin, CA	0.4 mile north of Site 2	Gasoline	T0600101446	Completed-Case Closed
Chevron #9-5542	7007 San Ramon Road, Dublin, CA	0.4 mile north of Site 2	Gasoline	T0600100354	Completed-Case Closed
Auto Parts Store	7100 Regional, Dublin, CA	0.4 mile north of Site 2	Unknown	T06019760478	Completed-Case Closed
Dublin Retail Center	7900 Dublin, Dublin, CA	0.4 mile north of Site 2	Gasoline	T06019769979	Completed-Case Closed
Bedford Properties	6700 Golden Gate, Dublin, CA	900 feet north of Site 2	Diesel	T0600100823	Completed-Case Closed
Montgomery Wards	7575 Dublin, Dublin, CA	0.5 mile north of Site 2	Gasoline	T0600100936	Completed-Case Closed
Aster Apartments–Long-Term Monitoring	6775 Golden Gate Drive	0.4 mile north of Site 2	Benzene, Gasoline, Naphthalene, Tetrachloroethylene (PCE), Trichloroethylene (TCE), Waste Oil/Motor/Hydraulic/Lubricating	T10000010517	Open-Long Term Management

Name	Address	Distance to Site ¹	Contaminant	Order/Case Number	Cleanup Status
Crown Chevrolet North Parcel	7544 Dublin Boulevard (And 6775 Golden Gate Drive), Dublin, CA	0.4 mile north of Site 2	Dichloroethene (DCE), Diesel, Gasoline, Tetrachloroethylene (PCE), Trichloroethylene (TCE), Vinyl Chloride, Waste Oil/Motor/Hydraulic/Lubricating	T10000001616	Completed-Case Closed
Crown Chevrolet South Parcel	6707 Golden Gate Drive, Dublin, CA	0.3 mile north of Site 2	Tetrachloroethylene (PCE)	T10000005449	Completed-Case Closed
Quest Laboratory	6511 Golden Gate Drive	0.3 mile north of Site 2	Diesel, Gasoline	T06019799610	Completed-Case Closed
Shamrock Ford (Toxic)	7499 Dublin, Dublin, CA	0.5 mile north of Site 2	Gasoline, MTBE/TBA/Other Fuel Oxygenates, Waste Oil/Motor/Hydraulic/Lubricating	T06019709822	Open-Inactive
Dublin Toyota Pontiac	6450 Dublin Court, Dublin, CA	0.4 mile north of Sites 4 and 5	Benzene, Ethylbenzene, Gasoline, MTBE/TBA/Other Fuel Oxygenates, Toluene, Xylene	T0600102153	Completed-Case Closed
Dublin Rock and Ready Mix	6393 Scarlett, Dublin, CA	0.4 mile north of Sites 4 and 5	Gasoline	T0600101601	Completed-Case Closed
Busick Gearing Properties	6341 Scarlett Court, Dublin, CA	0.3 mile north of Sites 4 and 5	Trichloroethylene (TCE)	SL20256874	Open-Assessment and Interim Remedial Action
Scotsman Group	6055 Scarlett, Dublin, CA	0.4 mile north of Sites 4 and 5	Gasoline	T0600101204	Completed-Case Closed
Charles Lemoane Property	6085 Scarlett, Dublin, CA	0.3 mile north of Sites 4 and 5	Gasoline	T0600101440	Completed-Case Closed
Valley Nissan Volvo	6015 Scarlett, Dublin, CA	0.3 mile north of Sites 4 and 5	Waste Oil, Motor, Hydraulic, Lubricating	T0600101149	Completed-Case Closed
Lew Dotty Cadillac	5787 Scarlett, Dublin, CA	0.4 mile northeast of Sites 4 and 5	Gasoline	T0600100828	Completed-Case Closed
Chevron #9-0917	5280 Hopyard, Pleasanton, CA	150 feet east of Site 4	Gasoline	T0600100345	Completed-Case Closed

Name	Address	Distance to Site ¹	Contaminant	Order/Case Number	Cleanup Status
Shell 313-5785	5251 Hopyard, Pleasanton, CA	160 feet west of Site 5	Gasoline	T0600101267	Completed-Case Closed
ANG Newspapers	4700 Willow Pleasanton, CA	0.2 mile east of Site 5	Gasoline	T0600147100	Completed-Case Closed
City Cleaners	4855 Hopyard Road, Suite C5 Pleasanton, CA	0.4 mile south of Site 5	Tetrachloroethylene (PCE), Trichloroethylene (TCE)	T10000008237	Open-Remediation
Hacienda Cleaners	5682 Stoneridge Drive, Pleasanton, CA	Adjacent to the southern boundary of Site 7	Tetrachloroethylene (PCE), Trichloroethylene (TCE)	SL0600138501	Completed-Case Closed
Britannia Business Center II	4280 Hacienda Drive, Pleasanton, CA	500 feet southwest of Site 7	Waste Oil, Motor, Hydraulic, Lubricating	T10000002920	Completed-Case Close
Pacific Bell	4568 Willow Road, Pleasanton, CA	0.3 mile southwest of Site 7	Diesel	T0600101024	Completed-Case Closed
GTE Mobilnet	4440 Willow Road, Pleasanton, CA	0.5 mile east of Site 3	Diesel	T0600101684	Completed-Case Closed
Shell # 13-5784	3790 Hopyard, Pleasanton, CA	0.2 mile southeast of Site 3	Gasoline	T0600101257	Completed-Case Closed
Foothill High School	4375 Foothill Road, Pleasanton, CA	0.3 mile north of Site 22	Waste Oil/Motor/Hydraulic/Lubricating	T0600101842	Completed-Case Closed
Merritt Property Development	4141 Foothill Boulevard, Pleasanton, CA	At the southern boundary of Site 22	Unknown	SL18383803	Completed-Case Closed
Laguna Oaks Site	3465 Old Foothill Road, Pleasanton, CA 94566	0.3 mile south of Site 22	Polychlorinated Biphenyls	T06019749061	Open-Inactive as of January 21, 2016
Laguna Oaks Property	Unknown Foothill Boulevard, Pleasanton, CA 94566	0.4 mile south of Site 22	Waste Oil/Motor/Hydraulic/Lubricating	T0600100807	Completed-Case Closed
Shell #16-5112	4895 Hacienda Drive	0.3 mile north of Sites 9 and 29	Gasoline	T1000000423	Completed-Case Closed

Name	Address	Distance to Site ¹	Contaminant	Order/Case Number	Cleanup Status
Alco Santa Rita Parcels 16 and Option	0 Dublin Boulevard, Dublin CA	0.2 mile north of Sites 9 and 29	Trichloroethylene (TCE)	T06019781402	Completed-Case Closed
The Green	5411 Martinelli Way, Dublin, CA	0.3 mile north of Site 29	Diesel, Gasoline, Other Insecticides/Pesticide/Fumigants/Herbicides, Other Solvent or Non-Petroleum Hydrocarbon, Tetrachloroethylene (PCE)	T10000005547	Open-Site Assessment
Santa Rita Old Graystone	580 Santa Rita	0.3 mile northeast of Site 9	Gasoline	T0600101197	Completed-Case Closed
Green on Park Place	5411 Martinelli Way, Dublin, CA	0.3 mile north of Site 29	Heating Oil, Fuel Oil	T1000000822	Completed-Case Closed
Avis Rent a Car System Inc	3956 Old Santa Rita, Pleasanton, CA	Adjacent to the western boundary of Site 11	Gasoline	T0600146719	Completed-Case Closed
Saturn of Pleasanton	4340 Rosewood, Pleasanton, CA	200 feet east of Site 11	Trichloroethylene (TCE)	SL0600171090	Completed-Case Closed
Shell #13-5786	6750 Santa Rita, Pleasanton, CA	800 feet southwest of Site 12	Gasoline	T0600102532	Completed-Case Closed
City of Pleasanton Fire Station # 3	3200 Santa Rita, Pleasanton, CA	0.5 mile northeast of Site 14	Diesel, Gasoline	T0600194363	Completed-Case Closed
Exxon #7-3567	3192 Santa Rita, Pleasanton, CA	0.5 mile northeast of Site 14	Gasoline	T0600136097	Completed-Case Closed
Valero #3827	3192 Santa Rita, Pleasanton, CA	0.5 mile northeast of Site 14	Gasoline	T0600100539	Completed-Case Closed
USL Pleasanton Lakes Parcel 946-1250-19-6	0 Mohr Avenue, Pleasanton, CA	800 feet south of Site 15	Unknown	T10000016201	Open-Site Assessment
USL Pleasanton Lakes Parcel 946-1350-3-18	0 Mohr Avenue, Pleasanton, CA	800 feet south of Site 15	Unknown	T10000016203	Open-Site Assessment

Name	Address	Distance to Site ¹	Contaminant	Order/Case Number	Cleanup Status
VIP Cleaners	1809 Santa Rita Road, Suite 5, Pleasanton, CA	450 feet west of Site 18	Tetrachloroethylene (PCE), Trichloroethylene (TCE)	T10000008254	Open-Remediation
Shell	1801 Santa Rita Road, Pleasanton, CA	Within the boundary of Site 18 (southern portion of the site)	Gasoline	T0600101232	Completed-Case Closed
Shell #13-5783	1800 Santa Rita Road, Pleasanton, CA	Within the boundary of Site 18 (southern portion of the site)	Gasoline	T0600144714	Completed-Case Closed
Amador High School	1155 Santa Rita, Pleasanton, CA	0.3 mile south of Site 19	Gasoline	T0600101906	Completed-Case Closed
Mobil #04-H6J	1024 Main, Pleasanton, CA	0.4 mile south of Site 19	Gasoline	T0600100909	Completed-Case Closed
Main Street Property	927 Main Street, Pleasanton, CA	0.4 mile south of Site 19	Benzene, Diesel, Ethylbenzene, Gasoline, MTBE/TBA/Other Fuel Oxygenates, Naphthalene, Stoddard Solvent/Mineral Spirits/Distillates, Toluene, Total Petroleum Hydrocarbons (TPH), Xylene	T10000008158	Completed-Case Closed
Unocal #0543	992 Main, Pleasanton, CA	0.4 mile south of Site 19	Gasoline	T0600100048	Completed-Case Closed
Frank Electric	1228 Quarry Lane, Pleasanton, CA	0.4 mile east of Site 19	Gasoline	T0600101912	Completed-Case Closed
Exxon #7-7003	349 Main, Pleasanton, CA	700 feet north of Site 25	Gasoline	T0600100451	Completed-Case Closed
Speedee Oil and Lube	44 Mission, Pleasanton, CA	0.3 mile south of Site 25	Gasoline	T0600101907	Completed-Case Closed

Name	Address	Distance to Site ¹	Contaminant	Order/Case Number	Cleanup Status
Oak Hill Cleaners	5410 Sunol Boulevard, Suite 1, Pleasanton, CA	0.3 mile south of Site 25	Unknown	T10000008264	Completed-Case Closed
Pleasanton City of Corp Yard	5335 Sunol Boulevard, Pleasanton, CA	0.3 mile south of Site 25	Gasoline	T0600100380	Completed-Case Closed
Pleasanton Assisted Living Facility	0 Junipero Street and Sunol, Pleasanton, CA	500 feet east of Site 23	Diesel, Waste Oil/Motor/Hydraulic/Lubricating	T06019724209	Open-Inactive
Nuodex	5555 Sunol Boulevard, Pleasanton, CA	Within the eastern boundary of Site 23	Solvents	T0600191469	Completed-Case Closed
MBM Corporation	5675 Sunol, Pleasanton, CA	Within the southern boundary of Site 23	Diesel	T0600126288	Completed-Case Closed
Kaiser Center for Technology	6177 Sunol Boulevard, Pleasanton, CA	0.4 mile south of Site 23	Unknown	T10000014063	Open-Inactive
Kaiser Aluminum and Chem Corporation	6177 Sunol Boulevard, Pleasanton, CA	0.4 mile south of Site 23	Diesel	T0600191128	Completed-Case Closed
B & J Trucking	3742 Valley, Pleasanton, CA	Adjacent to the northern boundary of Site 21a and 21b	Diesel	T0600101128	Completed-Case Closed
USL Pleasanton Lakes-Long-Term Monitoring	3000 Busch Road, Pleasanton, CA	Adjacent to the northern boundary of Site 21a and 21b	Unknown	T10000009398	Open-Long Term Management
Utility Vault Company	3786 Valley, Pleasanton, CA	400 feet south of Site 21a and 21b	Diesel	T0600101905	Completed-Case Closed
Pleasanton Ready Mix Concrete	3400 Boulder, Pleasanton, CA	Adjacent to southern boundary of Site 21a and 21b	Gasoline	T0600102087	Completed-Case Closed

Name	Address	Distance to Site ¹	Contaminant	Order/Case Number	Cleanup Status
Pleasanton Truck and Equipment	3110 Busch, Pleasanton, CA	Adjacent to the northern boundary of Site 21a and 21b	Diesel	T0600101091	Completed-Case Closed
Hanson Aggregates Legacy Radum Facility	3000 Busch, Pleasanton, CA	0.2 mile to the east of Site 21a and 21b	Asphalt, Diesel, Other Petroleum	SL0600101555	Open-Eligible for Closure
Hanson Aggregates Mid Pacific Inc	3000 Busch, Pleasanton, CA	0.2 mile to the east of Site 21a and 21b	Diesel, Gasoline	T06019765846	Completed-Case Closed
Kaiser Sand and Gravel	3000 Busch, Pleasanton, CA	0.2 mile to the east of Site 21a and 21b	Diesel	T0600100778	Completed-Case Closed
Hanson Aggregates Radum Plan	3000 Busch, Pleasanton, CA	0.2 mile to the east of Site 21a and b	Diesel, Waste Oil/Motor/Hydraulic/Lubricating	SLT19719376	Open-Eligible for Closure
Can Am Plumbing	151 Wyoming, Pleasanton, CA	0.2 mile south of Site 20	Gasoline	T0600156201	Completed-Case Closed
City of Pleasanton Theater Parking Lot	0 Kottinger Drive, Pleasanton, CA	0.3 mile northwest of Site 26	Lead	T10000001164	Open-Inactive
Old Pleasanton Landfill	2512 Vineyard, Pleasanton, CA	0.5 mile northwest of Site 27	None specified	T10000000095	Open-Closed/With Monitoring As of 4/3/1978
<p>Notes:</p> <p>¹ All distances are approximate</p> <p>Sources: California Department of Toxic Substances Control (DTSC). 2022. EnviroStor Database. Website: https://www.envirostor.dtsc.ca.gov/public/map/?myaddress=pleasanton. Accessed February 14, 2022.</p> <p>California State Water Resources Control Board (State Water Board). 2002. Geotracker. Website: https://geotracker.waterboards.ca.gov/map/?CMD=runreport&myaddress=pleasanton. Accessed February 15, 2022.</p>					

Regulatory Agencies

The Livermore-Pleasanton Fire Department (LPFD) is jointly operated by the cities of Livermore and Pleasanton and responds to hazardous materials calls and prepares emergency preparedness plans in addition to performing other emergency response responsibilities. The LPFD is not responsible for overseeing cleanup of contaminated sites but permits and oversees hazardous materials facilities and the removal and installation of underground storage tanks (USTs). The LPFD is responsible for implementing the local Unified Program (see Regulatory Framework, below) and for enforcing provisions of the Fire Code and Building Code pertaining to hazardous materials. The LPFD keeps a list of businesses that handle hazardous materials and conducts periodic inspections of these facilities.

Airport Hazards

The Livermore Municipal Airport is located approximately one mile east of the Pleasanton city limits, and the city is within the flight path for planes taking off and arriving at the Livermore Airport. The Alameda County Airport Land Use Commission (ALUC) provides airport safety zones based on a review of background reports cornering accident potential. The Alameda County Airport Land Use Policy Plan (ALUPP) includes policies and plans intended to guide the ALUC in reviewing proposed local agency actions, including General Plan changes and rezoning, to determine whether the changes are compatible with current and anticipated airport operations. To reduce the risk of accident related to airport hazards, the ALUC has placed limits on population density and structural development within the airport safety zones. As shown in Exhibit 3.8-2, Sites 12 (Pimlico Area, North side), 14 (St. Elizabeth Seton), 15 (Rheem Drive Area, southwest side), 21 and b (Kiewit) are within the Alameda County ALUPP Airport Influence Area (AIA), which is coterminous with the Alameda County ALUC Hazard Prevention Zone. None of the potential sites for rezoning are within an Airport Protection Area.

Wildfire Hazards

As discussed above, hazardous materials include materials with ignitability, or materials having the ability to burn, such as vegetation. Fire hazards present a considerable problem to vegetation and wildlife habitats throughout the city. Grassland fires are easily ignited, particularly in dry seasons. These fires are relatively easily controlled if they can be reached by fire equipment; burned slopes, however, are highly subject to erosion and gulying. While brushlands are naturally adapted to frequent light fires, fire protection in recent decades has resulted in heavy fuel accumulation on the ground. Wildfire is a serious hazard in undeveloped areas, particularly near areas of natural vegetation and steep slopes since fires tend to burn more rapidly on steeper terrain. Wildfire is also a serious hazard in areas of high wind, given that fires will travel faster and geographically farther when winds are higher.

According to the California Department of Forestry and Fire Protection (CAL FIRE), and as shown in Exhibit 3.8-3, most of the developed areas within the city are not within a Very High Fire Hazard Severity Zone (VHFHSZ) Local Responsibility Area (LRA); the eastern, southern, southeastern, and southwestern portion of the city are within moderate and high Fire Hazard Severity Zone (FHSZ) LRA; and a small portion of the southwestern portion of the city is within a very high FHSZ LRA. A small portion of the southwestern portion of Site 2 (Stoneridge Shopping Center, Mall) is within a moderate and high FHSZ LRA, Site 23 (Sunol Boulevard) is within a high FHSZ LRA to the west, most of Site 26 (St. Augustine) is within a moderate FHSZ LRA, and Site 27 (PUSD-Vineyard) is within a high FHSZ LRA. The land to the north of Site 21a and b (Kiewit) is designated as a moderate FHSZ LRA.

A small portion of the east of the city is within a moderate FHSZ State Responsibility Area (SRA) and a small southern portion of the city is within a moderate and high FHSZ SRA. There are also lands within a high FHSZ SRA to the northwest of the city, past the city limits, and a portion of land mapped moderate FHSZ SRA to the northeast of the city limits. The entirety of Site 1 (Lester) is within a high FHSZ SRA and the southern portion of Site 22 (Merritt) the portion not mapped as a

VHFHSZ LRA) is within a moderate FHSZ with the easternmost portion of the site mapped as an VHFHSZ SRA.⁷

Other Health and Safety Considerations

A PG&E natural gas pipeline in a 30-foot easement parallels the northern edge of the city, adjacent to the southern edge of I-580; it runs relatively close to Sites 9, 11, 12, 29. There is another PG&E natural gas pipeline 450 feet west of Site 2 (Stoneridge Shopping Center, Mall), and a third one that cuts across the city north to south within Santa Rita Road adjacent to Sites 11 (Old Santa Rita Area), 14 (St. Elizabeth Seton), 15 (Rheem Drive Area, southwest side), 16 (Tri-Valley Inn), 18 (Valley Plaza), 19 (Black Avenue), 23 (Sunol Boulevard), 24 (Sonoma Drive Area), and 25 (PUSD-District); and another within First Street/Stanley Boulevard adjacent to Sites 20 (Boulder Court), 21a and b (Kiewit), 23 (Sunol Boulevard), 24 (Sonoma Drive Area), and 25 (PUSD-District). There is a jet fuel pipeline that runs through the city that is near some of the potential sites for rezoning. It starts at the northern boundary of the city near the Dublin-Pleasanton Bay Area Rapid Transit (BART) station property and runs south to roughly the intersection of Valley Avenue and Stanley Boulevard (underneath the Iron Horse Trail corridor), and is adjacent to the southern boundary of Site 15 (Rheem Drive Area, southwest side) and stops just north of Site 21a and b (Kiewit) at Busch Road; it then turns southwest to the southern border of the city, and this portion of the jet fuel pipeline is near sites 23 (Sunol Boulevard), 24 (Sonoma Drive Area), and 25 (PUSD-District). There is another gas transmission pipeline that runs roughly parallel to the jet fuel pipeline for the portion of the jet fuel pipeline after it turns southwest from Site 21a and b (Kiewit) at Busch Road. Excavation in the vicinity of pipelines is regulated under the Natural Gas Pipeline Safety Act.⁸

3.8.3 - Regulatory Framework

Federal

Occupational Health and Safety Act

The Occupational Safety and Health Administration (OSHA) of the U.S. Department of Labor is responsible for implementing and enforcing federal laws and regulations that address worker health and safety. OSHA requires specific training for hazardous materials users and handlers, provision of information (procedures for personal safety, hazardous materials storage and handling, and emergency response) to employees who may be exposed to hazardous materials, and acquisition of material safety data sheets from materials manufacturers. Material safety data sheets describe the risks, as well as proper handling and procedures, related to particular hazardous materials. Employee training must include response and remediation procedures for hazardous materials releases and exposures.

Code of Federal Regulations, Titles 29 and 40

Regulations in Code of Federal Regulations Title 29 include requirements to manage and control exposure to LBP and ACM. In California, these requirements are implemented by the California

⁷ California Department of Forestry and Fire Protection (CAL FIRE). 2022. CAL FIRE and Resource Assessment Program (FRAP) Fire Hazard Severity Map. Website: <https://frap.fire.ca.gov/>. Accessed: July 7, 2022.

⁸ Pipeline and Hazardous Materials Safety Administration. 2007. National Pipeline Mapping System. Website: <https://pvnpm.phmsa.dot.gov/PublicViewer/>. Accessed February 9, 2022.

Occupational Safety and Health Administration (Cal/OSHA) under California Code of Regulations Title 8 (see further discussion of California Code of Regulations Title 8 below). The removal and handling of ACMs is governed primarily by EPA regulations under Code of Federal Regulations Title 40. The regulations require that the appropriate State agency be notified before any demolition, or before any renovations, of buildings that could contain asbestos or ACM above a specified threshold.

Resource Conservation and Recovery Act and Comprehensive Environmental Response, Compensation, and Liability Act

The EPA is responsible for implementing and enforcing federal laws and regulations pertaining to hazardous materials. The primary legislation includes the Resource Conservation and Recovery Act of 1976 (RCRA) and the Comprehensive Environmental Response, Compensation, and Liability Act of 1980 (CERCLA), as amended by the Superfund Amendments and Reauthorization Act (SARA) and the Emergency Planning and Community Right-to-Know Act (known as SARA Title III). RCRA and the 1984 RCRA Amendments regulate the treatment, storage, and disposal of hazardous and nonhazardous wastes and mandate that hazardous wastes be tracked from the point of generation to their ultimate fate in the environment, including detailed tracking of hazardous materials during transport and permitting of hazardous material handling facilities. As permitted by RCRA, in 1992, the EPA approved California's program called the Hazardous Waste Control Law (HWCL), administered by DTSC, to regulate hazardous wastes in California, as discussed further below. The purpose of CERCLA is to identify and clean up chemically contaminated sites that pose a significant environmental health threat, and the Hazard Ranking System is used to determine whether a site should be placed on the National Priorities List for cleanup activities. SARA relates primarily to emergency management of accidental releases and requires annual reporting of continuous emissions and accidental releases of specified compounds that are compiled into a nationwide Toxics Release Inventory. Finally, SARA Title III requires formation of state and local emergency planning committees that are responsible for collecting material handling and transportation data for use as a basis for planning and provision of chemical inventory data to the community at large under the "right-to-know" provision of the law.

Hazardous Materials Transportation Act

Under the Hazardous Materials Transportation Act of 1975, the United States Department of Transportation (USDOT), Office of Hazardous Materials Safety regulates the transportation of hazardous materials on water, rail, highways, through air, or in pipelines and enforces guidelines created to protect human health and the environment and reduce potential impacts by creating hazardous material packaging and transportation requirements. It also includes provisions for material classification, packaging, marking, labeling, placarding, and shipping documentation. The USDOT provides hazardous materials safety training programs and supervises activities involving hazardous materials. In addition, the USDOT develops and recommends regulations governing the multimodal transportation of hazardous materials.

Aboveground Petroleum Storage Act, and Spill Prevention, Control, and Countermeasure Rule

The Aboveground Petroleum Storage Act of 1990 and the Spill Prevention, Control, and Countermeasure (SPCC) Rule (amended 2010) of the Oil Pollution Prevention regulation (40 Code of Federal Regulations [CFR] 112) require the owner or operator of a tank facility with an aggregate

storage capacity greater than 1,320 gallons to notify the local Certified Unified Program Agency (CUPA) and prepare an SPCC plan. The SPCC plan must identify appropriate spill containment measures and equipment for diverting spills from sensitive areas and must discuss facility-specific requirements for the storage system, inspections, recordkeeping, security, and training.

Clean Water Act

The Clean Water Act (CWA) (Title 33 § 1251 *et seq.* of the United States Code [33 USC 1251, *et seq.*]) is the major federal legislation governing water quality. The CWA established the basic structure for regulating discharges of pollutants into waters of the United States (not including groundwater). The objective of the act is “to restore and maintain the chemical, physical, and biological integrity of the nation’s waters.” The CWA establishes the basic structure for regulating the discharge of pollutants into waters of the United States. Responsibility for administering the CWA resides with the State Water Board and nine Regional Water Quality Control Boards (RWQCBs); the San Francisco Bay RWQCB administers the CWA for the city.

Section 404 of the CWA regulates temporary and permanent fill and disturbance of waters of the United States, including wetlands. The United States Army Corps of Engineers (USACE) requires that a permit be obtained if a project proposes to place fill in navigable waters and/or to alter waters of the United States below the ordinary high-water mark in non-tidal waters. Section 401 of the CWA requires compliance with State water quality standards for actions within State waters. Compliance with the water quality standards required under Section 401 is a condition for issuance of a Section 404 permit. Under Section 401 of the CWA, every applicant for a permit or license for any activity that may result in a discharge to a water body must obtain a State water quality certification from the RWQCB to demonstrate that the proposed activity would comply with State water quality standards.

State

California Hazardous Waste Control Law

The HWCL is the primary hazardous waste statute in the State of California and implements RCRA as a “cradle-to-grave” waste management system for handling hazardous wastes in a manner that protects human health and the environment and would reduce potential resulting impacts. The law specifies that generators have the primary duty to determine whether their waste is hazardous and to ensure proper management. The HWCL also establishes criteria for the reuse and recycling of hazardous waste used or reused as raw materials. The law exceeds federal requirements by mandating source reduction planning, and a much broader requirement for permitting facilities that treat hazardous waste. It also regulates a number of types of waste and waste management activities that are not covered by federal law.

California Health and Safety Code

The California Health and Safety Code (HSC § 25141) defines hazardous waste as a waste or combination of waste that may:

. . . because of its quantity, concentration, or physical, chemical, or infection characteristics:

- (1) Cause or significantly contribute to an increase in mortality or an increase in serious irreversible or incapacitation-reversible illness.
- (2) Pose a substantial present or potential hazard to human health or the environment, due to factors including, but not limited to, carcinogenicity, acute toxicity, chronic toxicity, bioaccumulative properties, or persistence in the environment, when improperly treated, stored, transported, or disposed of or otherwise managed.

These regulations establish criteria for identifying, packaging, and labeling hazardous wastes; prescribe management practices for hazardous wastes; establish permit requirements for hazardous waste treatment, storage, disposal, and transportation; and identify hazardous waste that commonly would be disposed of in landfills.

Under both the RCRA and the HWCL, hazardous waste manifests must be retained by the generator for a minimum of 3 years. The generator must match copies of the manifests with copies of manifest receipts from the treatment, disposal, or recycling facility.

In accordance with Chapter 6.11 of the California Health and Safety Code (HSC § 25404, *et seq.*), local regulatory agencies enforce many federal and State regulatory programs through the CUPA program, including:

- Hazardous Materials Business Plans (HMBPs) (HSC § 25501, *et seq.*);
- State Uniform Fire Code (UFC) requirements (UFC § 80.103, as adopted by the State Fire Marshal pursuant to HSC § 13143.9);
- Underground storage tanks (HSC § 25280, *et seq.*);
- Aboveground storage tanks (HSC § 25270.5[c]); and
- Hazardous waste generator requirements (HSC § 25100, *et seq.*).

The LPFD is the CUPA for the city.⁹ As the CUPA, LPFD enforces State statutes and regulations through the Hazardous Materials Unified Program Agency (HMUPA). The HMUPA oversees aboveground petroleum tanks; generation of hazardous materials; storage and treatment; USTs; generation of medical waste; the California Accidental Release Prevention Program; and the Local Oversight Program, which interfaces with the State Water Board and the San Francisco RWQCB on LUSTs and UST release sites. An HMBP must be submitted if a facility ever handles any individual hazardous material in an aggregate amount equal to or greater than 55 gallons (liquids), 500 pounds (solids), or 200 cubic feet (gases). An HMBP must include:

- Details that include facility floor plans and identify the business conducted at the site;
- An inventory of hazardous materials handled or stored on the site;

⁹ California Environmental Reporting System. 2015. Unified Program Regulatory Directory: Livermore-Pleasanton Fire Department. Website: <https://cersapps.calepa.ca.gov/Public/Directory/RegulatorDetails/1029>. Accessed February 9, 2022.

- An emergency response plan; and
- A training program in safety procedures and emergency response for new employees who may handle hazardous materials, with an annual refresher course in the same topics for those same employees.

California Code of Regulations, Title 8

Cal/OSHA assumes primary responsibility for developing and enforcing workplace safety regulations. These regulations concern the use of hazardous materials in the workplace, including requirements for employee safety training; availability of safety equipment; accident and illness prevention programs; hazardous substance exposure warnings; and preparation of emergency action and fire prevention plans.

Cal/OSHA also enforces hazard communication program regulations, including procedures for identifying and labeling hazardous substances, and requires that safety data sheets (formerly known as material safety data sheets) be available for employee information and training programs. Cal/OSHA standards are generally more stringent than federal regulations.

California Code of Regulations, Title 8, Section 1529 authorizes Cal/OSHA to implement the survey requirements of Code of Federal Regulations Title 29 relating to asbestos. These federal and State regulations require facilities to take all necessary precautions to protect employees and the public from exposure to asbestos. Workers who conduct asbestos abatement must be trained in accordance with federal and Cal/OSHA requirements. The Bay Area Air Quality Management District (BAAQMD) oversees the removal of regulated asbestos-containing materials.

California Code of Regulations, Title 8, Section 1532.1 includes requirements to manage and control exposure to LBP. These regulations cover the demolition, removal, cleanup, transportation, storage, and disposal of lead-containing material. The regulations outline the permissible exposure limit, protective measures, monitoring, and compliance to ensure the safety of construction workers exposed to lead-based material. Loose and peeling LBP must be disposed of as a State and/or federal hazardous waste if the concentration of lead equals or exceeds applicable hazardous waste thresholds. Federal and Cal/OSHA regulations require a supervisor who is certified with respect to identifying existing and predictable lead hazards to oversee air monitoring and other protective measures during demolition activities in areas where LBP may be present. Special protective measures and notification of Cal/OSHA are required for highly hazardous construction tasks related to lead, such as manual demolition, abrasive blasting, welding, cutting, or torch burning of structures, where LBP is present.

California Code of Regulations Title 22, Division 4.5

California Code of Regulations, Title 22, Division 4.5, contains the Environmental Health Standards for the Management of Hazardous Waste, which includes California waste identification and classification regulations. California Code of Regulations, Title 22, Chapter 11, Article 3, "Soluble Threshold Limits Concentrations/Total Threshold Limits Concentration Regulatory Limits," identifies the concentrations at which soil is determined to be a California hazardous waste. California's Universal Waste Rule (22 California Code of Regulations [CCR] § 66273) provides an alternative set of management standards in

lieu of regulation as hazardous wastes for certain common hazardous wastes, as defined in California Code of Regulations, Title 22, Section 66261.9. Universal wastes include fluorescent lamps, mercury thermostats, and other mercury-containing equipment. Existing structures may contain fluorescent light ballasts that could contain mercury or lead. The Alternative Management Standards for Treated Wood Waste (22 CCR § 67386) were developed by the DTSC to allow for disposal of treated wood as a nonhazardous waste, to simplify and facilitate the safe and economical disposal of such waste. Chemically treated wood can contain elevated levels of hazardous chemicals (e.g., arsenic, chromium, copper, pentachlorophenol, or creosote) that equal or exceed applicable hazardous waste thresholds. The Alternative Management Standards provide for less stringent storage requirements and extended accumulation periods, allow shipments without a hazardous waste manifest and a hazardous waste hauler, and allow disposal at specific nonhazardous waste landfills.

Porter-Cologne Act

The Porter-Cologne Water Quality Control Act of 1969 (Porter-Cologne Act) is California's statutory authority for the protection of water quality. Under the Porter-Cologne Act, the State must adopt water quality policies, plans, and objectives that protect the State's waters for the use and enjoyment of the people. Regional authority for planning, permitting, and enforcement is delegated to the nine RWQCBs. The RWQCBs are required to formulate and adopt water quality control plans (also known as basin plans) for all areas of the region and establish water quality objectives in the plans. The Porter-Cologne Act sets forth the obligations of State Water Board and RWQCBs to adopt and periodically update water quality control plans that recognize and reflect the differences in existing water quality, the beneficial uses of the region's groundwater and surface water, and local water quality conditions and problems. It also authorizes the State Water Board and RWQCBs to issue and enforce waste discharge requirements and to implement programs for controlling pollution in State waters. Finally, the Porter-Cologne Act also authorizes the State Water Board and RWQCBs to oversee site investigation and cleanup for unauthorized releases of pollutants to soils and groundwater and in some cases to surface waters or sediments.

California Emergency Response Plan

California has developed an emergency response plan to coordinate emergency services provided by federal, State, and local governments and private agencies. Responding to hazardous materials incidents is one part of this plan. The plan is administered by the California Governor's Office of Emergency Services, which coordinates the responses of other agencies. LFPD coordinates response to emergencies in the city.

California Department of Forestry and Fire Protection

CAL FIRE has mapped fire threat potential throughout California. CAL FIRE maps fire threat based on the availability of fuel and the likelihood of an area burning (based on topography, fire history, and climate). The threat levels include no fire threat, moderate, high, and very high fire threat. Further, the maps designate the City of Pleasanton as the LRA. Callippe Preserve in the southern part of the city is within an SRA (Exhibit 3.8-3). CAL FIRE produced a 2019 Strategic Fire Plan for California, which contains goals, objectives, and policies to prepare for and mitigate the effects of fire on California's natural and built environments. CAL FIRE's Office of the State Fire Marshal provides oversight of enforcement of the California Fire Code as well as overseeing hazardous liquid pipeline safety.

California Building Standards Code

The State of California provided a minimum standard for building design through the 2019 California Building Standards Code (CBC), which is in Part 2 of Title 24 of the California Code of Regulations. The 2019 CBC is based on the 2018 International Building Code but has been modified for California conditions. It is generally adopted on a jurisdiction-by-jurisdiction basis, subject to further modification based on local conditions. Commercial and residential buildings are plan-checked by local city and county building officials for compliance with the CBC. Typical fire safety requirements of the CBC include the installation of sprinklers in all new high-rise buildings and residential buildings, the establishment of fire resistance standards for fire doors and building material and for particular types of construction.

California Public Resources Code

The California Public Resources Code includes fire safety regulations that restrict the use of equipment that may produce a spark, flame, or fire, require the use of spark arrestors¹⁰ on construction equipment that use an internal combustion engine, specify requirements for the safe use of gasoline-powered tools in fire hazard areas, and specify fire suppression equipment that must be provided on-site for various types of work in fire-prone areas.

These regulations include the following:

- Earthmoving and portable equipment with internal combustion engines would be equipped with a spark arrestor to reduce the potential for igniting a wildland fire (PRC § 4442);
- Appropriate fire suppression equipment would be maintained during the highest fire danger period—from April 1 to December 1 (PRC § 4428);
- On days when a burning permit is required, flammable materials would be removed to a distance of 10 feet from any equipment that could produce a spark, fire, or flame and the construction contractor would maintain the appropriate fire suppression equipment (PRC § 4427); and
- On days when a burning permit is required, portable tools powered by gasoline-fueled internal combustion engines would not be used within 25 feet of any flammable materials (PRC § 4431).

Regional

Bay Area Air Quality Management District

The BAAQMD has jurisdiction over the city and unincorporated areas and deals with pollutants, including hazardous air pollutants such as asbestos. Additional information on the BAAQMD and air quality is provided in Section 3.2, Air Quality of this Draft EIR.

¹⁰ A spark arrestor is a device that prohibits exhaust gases from an internal combustion engine from passing through the impeller blades where they could cause a spark. A carbon trap is commonly used to retain carbon particles from the exhaust.

Alameda County Airport Land Use Policy Plan

The State Aeronautics Act requires the preparation and implementation of Airport Land Use Compatibility Plans (ALUCPs) for nearly all public airports in the State. These plans are intended to ensure that incompatible development does not occur on land surrounding airports. To accomplish this goal, the State Aeronautics Act established ALUCs in counties having public use airports. The ALUCs are charged with developing, updating, and implementing these plans.

The Alameda County ALUC, the ALUC overseeing the Livermore Municipal Airport, adopted the ALUPP in 1977 which was amended in 1979 and again in 1986. In 2002, the Alameda County ALUC initiated an update of the 1986 ALUPP. The most recent update for the ALUPP for the Livermore Municipal Airport was part of that update.

Livermore-Pleasanton Fire Department Certified Unified Program Agency

The LFPD CUPA is the administrative agency that coordinates and enforces numerous local, State, and federal hazardous materials management and environmental protection programs in the city. The programs include the Hazardous Materials Business Plan Program, Underground Storage Tank Program, Aboveground Petroleum Storage Act Program, Hazardous Waste Generation Program, Tiered Permitting Program, for the on-site treatment of hazardous waste, and the California Accidental Release Prevention Program.¹¹

Tri-Valley Local Hazard Mitigation Plan

In 2018, the City of Pleasanton, the Cities of Livermore and Dublin, the LFPD, Dublin San Ramon Services District, and the Lawrence Livermore National Laboratory updated and adopted the Tri-Valley Local Hazard Mitigation Plan (LHMP). The Tri-Valley LHMP administers a uniform hazard mitigation strategy for the Tri-Valley Area and addresses several hazards including, but not limited to, wildland fire, floods, and earthquakes. The Tri-Valley LHMP includes nine area-wide mitigation actions and 11 Pleasanton specific mitigation actions including emergency response and evaluation plans, public outreach, building safety and retrofitting, emergency preparedness coordination, education, facility upgrades, and monitoring actions. The LHMP contains the following goals aimed at reducing the vulnerability from natural hazards:

- Ensure that hazards are identified and considered in land use decisions.
- Improve local emergency management capability.
- Promote community awareness, understanding, and interest in hazard mitigation policies and programs.
- Incorporate hazard mitigation as an integrated public policy and standard practice.
- Reduce community exposure and vulnerability to hazards where the greatest risk exists.
- Increase resilience of infrastructure and critical facilities.

¹¹ Livermore-Pleasanton Fire Department. 2022. Hazardous Materials Unified Program (CUPA). Website: <https://www.lpfire.org/about-us/fire-prevention-division/unified-program>. Accessed February 10, 2022.

- Promote an adaptive and resilient planning area that responds proactively to future conditions.
- Develop and implement mitigation strategies that identify the best alternative to protect natural resources, promote equity, and use public funds in an efficient and cost-effective manner.

Local

City of Pleasanton

Comprehensive Emergency Management Plan

The Comprehensive Emergency Management Plan addresses the response to emergency incidents associated with emergencies within the city. This Comprehensive Emergency Management Plan is based on the functions and principles of the California Standardized Emergency Management System, the National Incident Management System, and the Incident Command System.

General Plan

Public Safety Element

The Public Safety Element, Chapter 5 of the City of Pleasanton General Plan (General Plan), discusses hazardous wastes and materials in the context of operations within the city. Its purpose is to provide information, policies, and programs with the intent of reducing the potential for human injury and loss of life and to minimize property damage and economic and social disruption due to natural and man-made hazards. Projects must be generally consistent with the relevant guidelines outlined in the General Plan.

The General Plan sets forth numerous goals, objectives, policies, and actions associated with hazards including the following:

- Goal 3** Minimize the risks to lives, property, and the environment due to fire hazards within the Planning Area and provide the highest quality of emergency response service feasible.
- Policy 8** Provide an adequate level of fire and emergency medical equipment and personnel to protect the community.
- Policy 10** Strive to respond to all emergency calls within seven minutes of the time the call for service is received 90 percent of the time.
- Policy 11** Maintain or improve the City's existing Insurance Services Office fire protection rating of three.
- Policy 12** Upgrade the level of fire resistivity in all new and remodeled structures.
- Policy 13** Require fire mitigation measures in new and existing developments that reduce the fire threat to the structure and occupants. Require development outside the five-minute travel time and in Special Fire Protection Areas to provide effective fire prevention measures.

- Goal 5** Minimize the risks to lives and property due to potential exposure to hazardous materials.
- Policy 16** Regulate the transportation, delivery, use, and storage of hazardous materials within the city limits.
- Policy 17** Ensure that hazardous materials are not released as a result of construction activities and that any existing hazardous materials and potential contamination are remediated prior to development.
- Policy 18** Continue to encourage the reduction of solid and hazardous wastes generated within the City, in accordance with Countywide plans.
- Policy 19** Ensure convenient access for Pleasanton residents for the disposal of household hazardous wastes.
- Goal 6** Minimize the risks to lives and property due to air navigation hazards generated by the Livermore Municipal Airport.
- Policy 20** Work with the Alameda County Airport Land Use Commission, its staff, and airport stakeholders to address air navigation hazards.
- Program 20.1** Process applications requiring Airport Land Use Commission review in a manner consistent with Alameda County’s Airport Land Use Compatibility Plan for the Livermore Municipal; Airport.
- Policy 21** Work with the City of Livermore to address air navigation hazards.
- Goal 7** Protect the public in the event of a natural or human-caused disaster.
- Policy 22** Provide an adequate level of supplies at all critical facilities.
- Policy 23** In partnership with the Pleasanton Unified School District, prepare and keep current City emergency procedures in the event of potential natural or human-caused disaster.
- Policy 24** Promote public safety through public education programs.
- Policy 25** Partner with the business and non-profit communities for emergency preparedness to ensure continuity of business and service operations and the safety of employees immediately following an emergency.

Vineyard Avenue Corridor Specific Plan

Public Health and Safety Requirements Relating to Construction: In order to ensure that development of the Plan Area proceeds safely, the developers of future projects shall be required to comply with the following measures:

9. Prior to development of Lots 1, 2, 18, 19, 21, 22, 26, 28, 30, and 31, where nursery or significant agricultural operations now exist or once existed, a Phase I Environmental Site Assessment shall be conducted by a qualified environmental professional in accordance with the requirements of the American Society for Testing and Materials (ASTM) Standards. If the findings of the Assessment indicate the presence of, or potential for, hazardous materials use associated with the current or past agricultural uses of these sites, a Phase II Environmental Site Assessment shall be conducted by a qualified environmental professional to ascertain whether past or current land uses have contributed to soil and/or groundwater contamination at the site. Soil and groundwater samples collected during the Phase II Assessment shall be submitted to a California-certified laboratory for analysis.

The analytical results of the Phase II Assessment shall be evaluated by a qualified environmental professional to determine whether chemicals could pose a hazard to future site users, construction workers, or the environment. If chemicals at the site could pose a hazard, a qualified professional shall conduct a risk assessment to quantify hazards based on soil and/or groundwater sampling results, and develop appropriate remediation measures, as necessary, to reduce potential risks for future site users to acceptable levels. Potential remediation measures may include, but not be limited to, soil removal, capping with an impermeable cover, soil vapor extraction, and groundwater remediation and/or monitoring. Regulatory agency oversight shall be obtained, as appropriate, from the appropriate local and/or State agency.

- b. An inventory of the interior areas of all on-site agricultural structures shall be conducted by an environmental professional prior to their demolition. If hazardous materials are identified as being stored in these areas, such materials shall be transported to and disposed of/recycled at an appropriate off-site facility. Monitoring by an environmental professional during the removal of floors/foundation shall be conducted to determine whether hazardous materials spills are present or suspected to have occurred in these areas. After demolition, a report by the environmental professional shall be submitted to the city delineating whether hazardous materials appeared to be present below the floors or foundations. If hazardous materials are present, a soil-sampling plan shall be prepared and implemented prior to disturbance of native soils. The soils samples shall be collected by a qualified environmental professional and submitted to a California-certified laboratory for analysis. The analytical results shall be evaluated by a qualified environmental professional for development of an appropriate health and safety plan for construction workers involved in site-demolition activities, waste disposal options, and potential site investigation/remediation.
- c. A Spill and Pollution Prevention Plan shall be prepared by the developer of each project with soil disturbance (e.g., grading) of at least 5 acres. The Plan must: (1) be prepared prior to the start of earthwork activities; (2) designate an on-site employee responsible for Plan implementation; and (3) include anticipated equipment needs and maintenance, emergency response procedures for hazardous materials releases, and procedures for contacting designated regulatory agencies in the event of a hazardous materials release.

- d. Removal of aboveground or underground fuel tanks shall take place in accordance with the requirements of the Livermore-Pleasanton Fire Department if these are to be removed as part of development under the Specific Plan.
- e. Demolition of all structures shall be conducted in accordance with applicable requirements of the California Department of Industrial Relations (Cal/OSHA) for lead, with appropriate follow-up measures taken if lead-based paint is found.
- f. Demolition of all structures shall be conducted in accordance with the requirements of Cal/OSHA and the Bay Area Air Quality Management District (BAAQMD) for asbestos, with appropriate follow-up measures if asbestos is found.
- g. Notification of the Underground Services Alert (USA) as well as site tenants shall take place prior to ground-breaking to obtain information on the location of possible underground utilities.

Pleasanton Municipal Code

The Pleasanton Municipal Code (Municipal Code) includes several regulations pertaining to hazards and hazardous materials and fire safety, which are summarized below.

Hazardous Materials/Hazardous Waste Ordinances

Chapter 9.16 addresses the implementation of Senate Bill 1082 CUPA programs. Such programs include hazardous materials release response plans and inventories, the California Accidental Release Prevention Program, underground and aboveground storage tanks oversight, and hazardous waste generators and on-site treatment oversight. Pursuant to this Ordinance, the LPPD assumes authority, responsibility, and enforcement authority as the CUPA for the City.

Fire Safety Ordinances

The Pleasanton Municipal Code contains three sections that bear directly on fire safety. The Building Code, Chapter 20.08, provides minimum standards for design, construction, materials, occupancy, location, and maintenance of all buildings within the city. The Fire Code, Chapter 20.24, regulates how a building is used, how machines and equipment are maintained, how hazardous materials are handled and stored, and how access to and from a site is provided. The Subdivision Ordinance, Chapter 19.36, establishes standards for roadway dimensions, subdivision layout, and public improvements needed to protect public safety. In addition, all new developments are reviewed by City departments for their potential effects on public safety, and conditions of approval are attached to minimize such effects and inspections are conducted to ensure proper installation. Developments located outside the 5-minute response time areas are required to provide additional fire mitigation measures, which include, at a minimum, automatic fire sprinkler systems.

Chapter 9.14 addresses stormwater management and discharge control. These provisions implement the Alameda County-wide Municipal Regional Stormwater NPDES permit. Provisions prevent hazardous materials from entering the stormwater system.

Chapter 9.21 covers construction and demolition debris. Any project that is regulated by the City must submit a waste management plan (WMP) prior to construction, demolition, or any similar

construction permit. The WMP requires the applicant to disclose estimated quantities of materials that will be salvaged, recycled, or disposed including the hauling method and facility being utilized for construction or demolition materials.

Title 11, Vehicles and Traffic, regulates commercial vehicles, routes, loads and other safety considerations. Permits can be required for certain loads, with timing and route restrictions for public safety. This may include review by the Police Department and/or City Engineer for oversized or overweight vehicles, including those transporting hazardous materials.

3.8.4 - Impacts and Mitigation Measures

Significance Criteria

The City is utilizing the questions in Appendix G of the California Environmental Quality Act (CEQA) Guidelines to establish thresholds of significance for this project. To determine whether impacts related to hazards and hazardous materials have significant environmental effects, the following questions are analyzed and evaluated. Would the Housing Element Update:

- a) Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials?
- b) Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment?
- c) Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?
- d) Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment?
- e) For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard or excessive noise for people residing or working the project area?
- f) Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?
- g) Expose people or structures, either directly or indirectly to a significant risk of loss, injury, or death involving wildland fires?

Approach to Analysis

This evaluation focuses on whether the implementation of the Housing Element Update would result in changes to the physical environment that would cause or exacerbate adverse effects related to the use, transportation, disposal, accidental release, or emission of hazardous materials. The evaluation also includes a determination of whether implementation of the Housing Element Update would result in changes to the physical environment, or would impair or interfere with emergency response

plans, or would expose people or structures to increased wildfire hazards or dangers. The following analysis is based, in part, on the available Cortese List data and the General Plan.

Additional analyses regarding hazards and health risk related to emissions of toxic air contaminants (TACs) are addressed in Section 3.2, Air Quality. Flooding and inundation hazards, including those related to erosion and mudflow, are addressed in Section 3.9, Hydrology and Water Quality. Traffic-related safety hazards are addressed in Section 3.14, Transportation. Other geotechnical-related safety hazards, such as earthquakes, are addressed in Section 3.6, Geology and Soils. Finally, excessive noise exposure with respect to airport use or air traffic is addressed in Section 3.11, Noise.

Hazards and hazardous materials impacts associated with the development on the Dublin-Pleasanton BART station property were fully evaluated in the 2015-2023 (5th Cycle) Housing Element Supplemental Environmental Impact Report (State Clearinghouse No. 011052002) and no additional impacts with respect to hazards and hazardous materials are associated with the Housing Element Update; therefore, this analysis does not include that site.

Impact Evaluation

Routine Transport, Use, or Disposal of Hazardous Materials

Impact HAZ-1: **Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials.**

The Housing Element Update is a policy document and adoption of the Housing Element Update alone would not produce environmental impacts because the Housing Element Update does not propose demolition, construction, or other development; rather, it provides capacity for future housing development consistent with State Housing Element Law and the Regional Housing Needs Allocation.

Development consistent with the Housing Element Update would be expected to involve the transport, use, and disposal of hazardous materials, such as diesel fuels, aerosols, and paints. Hazardous materials, such as fuel or solvents, could accidentally spill, which could create hazards that could degrade groundwater quality or contaminate soils. Development consistent with the Housing Element Update would be subject to the Hazardous Materials Transportation Act, California Public Resources Code, and other State and local regulations that would reduce and limit the associated risks. Any handling, transporting, use, or disposal of hazardous materials would comply with applicable laws, policies, and programs set forth by various federal, State, and local agencies and regulations, including the EPA, RCRA, Caltrans, the LHMP, Title 22 and 26 of the California Code of Regulations governing hazardous materials transport, and Title 19 of the California Code of Regulations and Chapter 6.95 of the Health and Safety Code for site remediation.

Development consistent with the Housing Element Update could include the demolition of existing structures, especially older structures that could conceivably contain ACM, LBP, mercury, and polychlorinated biphenyl caulk. In addition, tailpipe emissions from automobiles using leaded gasoline contained lead and resulted in Aerially Deposited Lead (ADL) being deposited in and along

roadways throughout the State. However, no specific buildings are identified for demolition, and it would be speculative to analyze potential effects with any degree of specificity. Development consistent with the Housing Element Update would comply with all applicable regulations for management of hazardous materials during the construction phase of development. Demolition and construction activities associated with future housing development consistent with the Housing Element Update could require transport of hazardous materials (e.g., ACM, LBP, and/or contaminated soils). This transport would be limited in duration and would be required to comply with numerous federal, State, and local regulations that establish specific guidelines regarding the use, transportation, and disposal of hazardous materials. Regulations that would be required of those transporting, using, or disposing of hazardous materials during construction of projects consistent with the Housing Element Update include: RCRA, regulating hazardous wastes; CERCLA, regulating closed and abandoned hazardous waste sites; the Hazardous Materials Transportation Act, governing hazardous materials transportation on U.S. roadways; International Fire Code (IFC), establishing procedures and mechanisms to ensure the safe handling and storage of hazardous materials; Title 22, regulating the generation, transportation, treatment, storage and disposal of hazardous waste; Title 27, regulating the treatment, storage and disposal of solid wastes; and Title 8 Standards for handling asbestos and lead during demolition/construction. There are established measures that certified contractors are required to use to contain, store, and dispose of these hazardous materials in a manner which limits exposure, the first step of which is to conduct surveys to identify the presence of these materials. Additionally, the Clean Air Act and Cal/OSHA regulate ACMs as hazardous air pollutants and potential worker safety hazards, respectively. Both the federal and Cal/OSHA regulate worker exposure to LBP during construction activities. Finally, Government Code Section 65850.2 requires a verification that the owner or authorized agent has met, or is meeting, the applicable requirements of the Health and Safety Code, Division 20, Chapter 6.95, Article 2, Sections 25500 through 25520 prior to receiving the final certificate of occupancy or its substantial equivalent.

Hazardous materials used as part of development may vary but would likely be limited to small quantities of fertilizers, herbicides, pesticides, solvents, cleaning agents, and similar materials used for daily residential and commercial operations and maintenance activities. These types of materials are common for residential and commercial developments and represent a low risk to people and the environment when used as intended.

Further, compliance with federal, State, and local law and applicable plans and regulations, including General Plan goals and policies, including, but not limited to, Goal 5, Policy 16, which requires the City to regulate the transportation, delivery, use, and storage of hazardous material within the city limits; Policy 17, which mandates that hazardous materials are not released results from construction activities and any existing hazardous materials and potential contamination are remediated prior to development; and Policy 19, which ensures convenient access for city residents to dispose of household waste, of Chapter 5, Public Safety Element, would provide public protection from hazards associated with the use, transport, treatment, and disposal of hazardous substances. The Housing Element Update, as a policy document, would not significantly increase the exposure of hazardous materials to the public and the environment. Therefore, impacts related to public hazard

risk as a result of hazardous materials transport, use, or disposal during construction or operation would be less than significant.

Level of Significance

Less than significant impact.

Hazardous Materials Risk of Upset

Impact HAZ-2: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments could create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the likely release of hazardous materials into the environment.

The Housing Element Update is a policy document and adoption of the Housing Element Update alone would not create a significant hazard to the public because the Housing Element Update does not propose demolition, construction, or other development; rather, it provides capacity for future housing development consistent with State Housing Element Law and the Regional Housing Needs Allocation.

Construction activities associated with the development on the potential sites for rezoning would have the potential to release potentially hazardous soils- and groundwater-based materials into the environment during site grading and excavation operations. However, development of the potential sites for rezoning is not expected to result in the transport, use, storage, or disposal of substantial amounts of hazardous materials, with the exception of common residential and commercial-grade hazardous materials such as household cleaners and paint, among others.

As listed in Table 3.8-1 and Exhibits 3.8-1a and 3.8-1b, several documented release sites are within 0.5 mile of the potential sites for rezoning. In addition, DTSC notes that Site 22 (Merritt) is a currently inactive DTSC site but needs further evaluation regarding previously detected volatile organic chemicals (VOCs) and organochlorine pesticides in soil and groundwater.¹² Construction activities at these sites would likely involve ground-disturbing activities that could expose workers, the public, and the environment to contaminated soil and groundwater, if present. To prevent and minimize hazardous condition to below a level of significance, existing local, State, and federal law, including those listed under Section 3.8.3 Regulatory Framework, would be enforced at all construction sites. For example, compliance with existing regulations would ensure that construction workers and the public are not exposed to any risks related to hazardous materials during demolition and construction. Future projects would comply with Cal/OSHA regulations concerning the use of hazardous materials, including requirements for safety training, exposure warnings, availability of safety equipment, and preparation of emergency action/prevention plans. All contaminated waste must be collected and disposed of at an appropriately licensed disposal or treatment facility.

Future development (including redevelopment of existing developed sites) must comply with the California Code or Regulations. Title 8 of the California Code of Regulations establishes Cal/OSHA

¹² California Department of Toxic Substances Control (DTSC). 2022. Response to Notice of Preparation of a Draft Environmental Impact Report for the City of Pleasanton 2023-2031 (6th Cycle) Housing Element Update Program – Dated April 2022 (State Clearinghouse Number: 2022040091). May 5.

requirements related to public and worker protection. Topics addressed include materials exposure limits, equipment requirements, protective clothing, hazardous materials, and accident prevention. Construction safety and exposure standards for lead and asbestos are set forth in Title 8. Title 17 of the California Code of Regulations establishes regulations relating to use and disturbance of materials containing naturally occurring asbestos. Soil excavated during construction is regulated under Title 22 of the California Code of Regulations. The local CUPA is responsible for ensuring that the California Code of Regulations and all other programs related to hazardous materials are implemented during construction activities.

As described in Section 3.9, Hydrology and Water Quality, future development that disturbs 1 acre or more of soil, or that is part of a common plan of development that disturbs 1 acre or more of soil, must obtain permit coverage under the Construction General Permit by filing a Notice of Intent (NOI) and Storm Water Pollution Prevention Plan (SWPPP) with the RWQCB prior to commencement of construction. The SWPPP must describe the site, facility, erosion and sediment controls, runoff water quality monitoring, means of waste disposal, implementation of approved local plans, control of construction sediment and erosion, maintenance responsibilities, and non-stormwater management controls. The Best Management Practices (BMPs) in the SWPPP include measures to prevent spills and require on-site materials for cleanup.

Given documented release sites are within 0.5 of the potential sites for rezoning, there is potential for contamination at several sites. Mitigation Measure (MM) HAZ-2 requires the preparation of a Phase I Environmental Site Assessment (Phase I ESA) and Phase II ESA (as necessary) for review and approval by the City and completion of any necessary remedial activities to be conducted under the oversight of the appropriate regulatory agency. MM HAZ-2 would comply with the public health and safety requirements included in the Vineyard Avenue Corridor Specific Plan relating to construction for Site 27 (PUSD-Vineyard) pursuant to subsection a.

Because significant agricultural operations have existed on Site 27 (PUSD-Vineyard), an inventory of the interior areas of all on-site agricultural structures would be conducted by an environmental professional prior to their demolition, and monitoring by an environmental professional during the removal of floors/foundation would be conducted to determine whether hazardous materials spills are present or suspected to have occurred in these areas, and a report would be provided to the City documenting the findings as required by subsection b. Development on Site 27 (PUSD-Vineyard) would comply with subsection c, regulating spills and pollution, subsection d, regulatory aboveground or underground fuel tanks, subsections e and f, regulating demolition of structures, and subsection g regulating the obtaining of information related to possible underground utilities.

During project operations, hazardous materials may be handled. Because of the nature of development, hazardous materials used on-site may vary but would likely be limited to small quantities of fertilizers, herbicides, pesticides, solvents, cleaning agents, and similar materials used for daily residential and commercial operations and maintenance activities. These types of materials are common for residential and commercial developments and represent a low risk to people and the environment when used as intended. Compliance with applicable plans and regulations, including General Plan goals and policies, including, but not limited to, Goal 5 and Policies 17 and 19 of Chapter 5, Public Safety Element, as described in more detail in Impact HAZ-1, as well as

applicable policies of the Vineyard Avenue Corridor Specific Plan, would provide public and environmental protection from reasonably foreseeable upset and accident conditions involving the likely release of hazardous materials during project operation.

Other Health and Safety Concerns

As noted in Section 3.8.2, Environmental Setting, ground-disturbing activities associated with development consistent with the Housing Element Update could lead to the rupture of a PG&E or other pipeline (such as the jet fuel pipeline described above) if there is not proper coordination with utility owners. Prior to the start of construction activities, developers and their contractors would be required to coordinate with the City's Public Works Department and utility owners through notification of the Underground Service Alert system to precisely locate any subsurface utilities.

Overall

The Housing Element Update itself, as a policy document, would not significantly increase the exposure of hazardous materials to the public or the environment. However, compliance with applicable federal, State, and local laws, and plans and regulations, as described above, and implementation of MM HAZ-2 would provide public protection from hazards associated with the use, transport, treatment, and disposal of hazardous substances during construction and operation of development consistent with the Housing Element Update. Therefore, impacts related to public hazard risk as a result of hazardous materials transport, use, or disposal would be less than significant with mitigation.

Level of Significance Before Mitigation

Potentially significant impact.

Mitigation Measures

MM HAZ-2 Environmental Site Assessment

If a potential site for rezoning is suspected to contain hazardous materials, prior to building permits, the City shall ensure that each project applicant retain a qualified environmental consulting firm to prepare a Phase I Environmental Site Assessment (Phase I ESA) in accordance with the American Society for Testing and Materials (ASTM) Standards in effect at the time of request of issuance of building permits, which would ensure the City is aware of any hazardous materials on-site. The Phase I ESA shall determine the presence of recognized environmental conditions and provide recommendation for further investigation (e.g., preparation of a Phase II ESA, if applicable). Prior to receiving a building or grading permit, project applicants shall provide documentation from the overseeing agency (e.g., Alameda County Environmental Health [ACEH] or Regional Water Quality Control Board) that sites with identified contamination have been remediated to levels where no threat to human health or the environment remains for the proposed uses.

Level of Significance After Mitigation

Less than significant impact with mitigation incorporated.

Hazardous Emissions Proximate to a School

Impact HAZ-3: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school.

There are schools within 0.25 mile of the potential sites for rezoning. As described under Impacts HAZ-1 and HAZ-2, development consistent with the Housing Element Update would not result in the handling of significant quantities of hazardous materials, substances, or wastes. During construction and operation, hazardous materials may be handled on the sites as residential and commercial land uses do involve the handling, storage, and disposal of limited quantities of hazardous materials. However, these uses are not generally associated with any releases that would adversely affect any schools located within a quarter mile of the potential sites for rezoning. Furthermore, development and operation of the uses on-site would comply with applicable federal, State, and local laws, and applicable plans and regulations. Compliance with existing applicable local, State, and federal regulatory requirements related to the handling and storage of hazardous materials would ensure that the potential release of hazardous materials associated with development consistent with the Housing Element Update would be less than significant. Additionally, approval of the Housing Element Update itself, as a policy document update, would not significantly increase the risk of the release of hazardous materials. Therefore, operational impacts related to hazardous emissions proximate to a school would be less than significant.

Level of Significance

Less than significant impact.

Government Code Section 65962.5 Sites

Impact HAZ-4: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments could be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, could create a significant hazard to the public or the environment.

As described in Impact HAZ-2, several of the potential development sites are near identified contamination sources that have not been fully remediated; in addition, several former hazardous waste sites that have been fully remediated exist near potential development sites (see Table 3.8-1 and Exhibits 3.8-1a and 3.8-1b). As discussed in Impact HAZ-2, if a potential site for rezoning is suspected to contain hazardous materials, further site characterization and/or remediation work would be required to ensure that construction activities would not expose people or the environment to adverse effects, as required by MM HAZ-2. Land uses and structures intended for human occupancy would not be permitted by the overseeing agency (e.g., ACEH or RWQCB) on sites where the potential threat to human health or the environment is present. Therefore, with implementation of MM HAZ-2 and compliance with applicable federal, State, and local laws, as well as compliance with plans and regulations, as described above, impacts related to the creation of a hazard to the public or environment would be less than significant with mitigation.

Level of Significance Before Mitigation

Potentially significant impact.

Mitigation Measures

Implement MM HAZ-2.

Level of Significance After Mitigation

Less than significant impact with mitigation incorporated.

Proximity to Public Airport Safety Hazard

Impact HAZ-5: For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, development facilitated by the Housing Element Update, rezonings, and General Plan, and Specific Plan Amendments would not result in a safety hazard or excessive noise for people residing or working the project area.

The Livermore Municipal Airport is located approximately 1 mile east of the city limits, and the city is within the flight path for planes taking off and arriving at the Livermore Airport. As shown in Exhibit 3.8-2, Sites 12 (Pimlico Area), 14 (St. Elizabeth Seton), 15 (Rheem Drive Area), and 21ab (Kiewit) are within the Alameda County ALUPP AIA, which is coterminous with the Alameda County ALUC Hazard Prevention Zone. None of the potential sites for rezoning are within an Airport Protection Area.

Pursuant to Goal 6, Policy 20, and Program 20.1 of Chapter 5, Public Safety, of the General Plan, developments within the Alameda County ALUPP AIA would be required to undergo federal, State, and local regulatory review processes specific to airport noise, airspace safety, and other land use compatibility standards, including 14 Code of Federal Regulations Part 77 regulations for the safety, efficient use, and preservation of navigable airspaces. Sites 12 (Pimlico Area, North side), 14 (St. Elizabeth Seton), 15 (Rheem drive Area, southwest side), 21 a and b (Kiewit) would be evaluated for consistency with the 2011 California Airport Land Use Planning Handbook and the Alameda County Airport ALUCP. In reviewing individual project applications, the City would determine which policies and actions apply and whether project modifications would be required to ensure compatibility with the ALUCP, depending on the specific characteristics of the project type and/or project site during the development review process. Buildings within the ALUCP AIA would be required to comply with Federal Aviation Administration (FAA) regulations for height. Therefore, impacts related to exposure of people to safety hazards or excessive noise in proximity to an airport would be less than significant.

Level of Significance Before Mitigation

Less than significant impact.

Emergency Response and Evacuation

Impact HAZ-6: Development facilitated by the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan.

During construction of development consistent with the Housing Element Update, it is expected that construction equipment and vehicles would be accessing and leaving the sites, which in turn could potentially impede evacuation or emergency vehicle access. During construction, development would comply with the Tri-Valley LHMP and the Comprehensive Emergency Management Plan, ensuring efficient response to emergency incidents associated with emergencies affecting the city. Therefore, construction impacts related to emergency response and evacuation would be less than significant.

The Comprehensive Emergency Management Plan outlines general procedures in response to emergency crises, such as evacuations. The Comprehensive Emergency Management Plan establishes an emergency organization to direct and control operations during a period of emergency by assigning responsibilities to specific personnel, which would not be altered by development consistent with the Housing Element Update.

The main roads into and out of the vicinity of the potential sites for rezoning would be in Interstate 680 (I-680) in the north–south direction and I-580 in the east west direction. These roads would act as the main evacuation routes into and out of the city. With adherence to the procedures of the Tri-Valley LHMP and the Comprehensive Emergency Management Plan, development consistent with the Housing Element Update would not conflict with an adopted emergency response plan. In addition, development consistent with the Housing Element Update would comply with applicable plans and regulations including the Alameda County Disaster Plan and General Plan goals and policies such as Policy 22, which mandates the City to provide an adequate level of supplies at all critical facilities; Policy 23, which mandates the preparation of City emergency produces in the event of a natural or human-caused disaster; Policy 24, which promotes public safety through public education programs; and Policy 25, which requires the City to partner with business and non-profit communities for emergency preparedness. Thus, compliance with existing applicable local, State, and federal regulatory requirements related to emergency response and evacuation and policies would ensure consistency with emergency preparedness plans. Additionally, approval of the Housing Element Update itself, as a policy document update, would not significantly impact any plan. With adherence to applicable plans and policies, operational impacts related to emergency response and evacuation would be less than significant.

Level of Significance

Less than significant impact.

Wildland Fires

Impact HAZ-7: **Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not expose people or structures, either directly or indirectly to a significant risk of loss, injury or death involving wildland fires.**

According to CAL FIRE, and as shown in Exhibit 3.8-3, most of the developed areas within city are not within a VHFHSZ LRA; the eastern, southern, southeastern, and southwestern portion of the city are within a moderate and/or high FHSZ LRA; and a small portion of the southwestern portion of the city is within a very high FHSZ LRA. A small portion of the southwestern portion of Site 2 (Stoneridge

Mall) is within a moderate and high FHSZ LRA, Site 23 (Sunol Boulevard) is within a high FHSZ LRA to the west, most of Site 26 (St. Augustine) is within a moderate FHSZ LRA, Site 27 (PUSD-Vineyard) is within a high FHSZ LRA, and the land to the north of Site 21a and b (Kiewit) is designated as a moderate FHSZ LRA.

A small portion of the east of the city is within a moderate FHSZ SRA and a small southern portion of the city is within a moderate and high FHSZ SRA. There are also lands within a high FHSZ SRA to the northwest of the city, past the city limits and a portion of land mapped moderate FHSZ SRA to the northeast of the city limits. The entirety of Site 1 (Lester) is within a high FHSZ SRA and the southern portion of Site 22 (Merritt) (the portion not mapped as a VHFHSZ LRA) is within a moderate FHSZ with the easternmost portion of the site mapped as a VHFHSZ SRA.¹³ While most of the sites are not within FHSZs, development consistent with the Housing Element Update could result in additional residential and commercial development on the potential sites for rezoning, some of which could occur in areas within or adjacent to lands mapped within SRA or LRA FHSZs. As such, development consistent with the Housing Element Update could expose people or structures, either directly or indirectly, to a risk of loss, injury, or death involving wildland fires.

The City and LFPD have plans, policies, actions, and ordinances in place to reduce the risks associated with wildland fires as described below.

The Tri-Valley LHMP, described above in the Regulatory Framework section provides recommendations that have been identified for the Tri-Valley Area, which would assist in reducing wildfire risk for development consistent with the Housing Element Update.¹⁴

- Public education and outreach to people living in or near the fire hazard zones should include information about and assistance with mitigation actions such as defensible space and advance identification of evacuation routes and safe zones.
- Future growth into Wildland-Urban Interface (WUI) areas should continue to be managed, particularly in the western hillside area of the city.
- Area fire districts need to continue to train on WUI events.
- Vegetation management activities should include enhancement through expansion of the target areas as well as additional resources.
- Regional consistency of higher building codes standards such as residential sprinkler requirements and prohibitive combustible roof standards.

It should be noted that the Tri-Valley LHMP determined that the highly urbanized portions of the city have little or no wildfire risk exposure and the expansion of the WUI can be managed with strong land use and building codes. Furthermore, as the city experiences future growth, it is anticipated

¹³ California Department of Forestry and Fire Protection (CAL FIRE). 2022. CAL FIRE Fire and Resource Assessment Program (FRAP) Fire Hazard Severity Map. Website: <https://frap.fire.ca.gov/>. Accessed: July 7, 2022.

¹⁴ Tetra Tech. 2018. Tri-Valley Local Hazard Mitigation Plan: Volume 1-Planning Area-Wide Elements. September. Website: <https://www.cityofpleasantonca.gov/civicax/filebank/blobload.aspx?BlobID=35090>. Accessed March 17, 2022.

that the exposure to wildland fire hazards would remain as assessed in the Tri-Valley LHMP or decrease over time due to capabilities afforded by strong land use and building codes.¹⁵

The LFPD reviews architectural and development plans to ensure that new development projects meet fire protection and emergency access requirements in accordance with Chapter 20.24.010 of the Municipal Code, which implements the California Fire Code on a local level. For example, buildings and structures located in or adjacent to fire hazard areas (i.e., Sites 1 [Lester], 2 [Stoneridge Shopping Center, Mall], 22 [Merritt], 24 [Sonoma Drive Area], 21a and b [Kiewit], and 27 [PUSD-Vineyard]) shall maintain the required hazardous vegetation and fuel management as well as defensible space as outlined in Government Code Sections 51175-51189 and local standards. In addition, the LFPD will review plans to ensure that fire sprinklers, fire alarms, and fire extinguishers are up to current code and appropriately located within proposed buildings or structures.

The General Plan contains policies and programs that reduce risks from wildland fires before development occurs. Specifically, Goal 3, Policy 8, Policy 10, Policy 11, Policy 12, and Policy 13 of Chapter 5, Public Safety Element, mandate design features to reduce structures' susceptibility to fire and coordination between the City and emergency services to provide adequate emergency medical equipment and personnel to protect the community in case of emergency. Policies 24 and 25 require coordination between the City and public and private agencies to protect the public in the event of natural or human-caused disasters.

As the City receives development applications for subsequent development consistent with the Housing Element Update, those applications would be reviewed by the City and for compliance with the policies and programs of the General Plan to reduce the exposure of people or structures, either directly or indirectly, to a risk of loss, injury, or death involving wildland fires. In addition, the Municipal Code, which implements the General Plan would be reviewed when development applications are received, including Chapter 20.08, Pleasanton Building Code (which adopts the CBC), Chapter 20.10, Pleasanton Residential Code (which adopts the California Residential Code), Chapter 20.32, Dangerous Building Code, and Chapter 20.24, Fire Code (which adopted the California Fire Code).

In conclusion, compliance with existing applicable local, State, and federal regulatory requirements would ensure that impacts associated with wildland fires would be less than significant. Additionally, approval of the Housing Element Update itself, as a policy document update, would not significantly increase or exacerbate impacts associated with wildland fires. Development consistent with the Housing Element Update is generally focused in already developed areas of the city; however, development could result in an incremental increase in exposure of people and structures to wildland fires and associated hazards within the potential sites for rezoning. However, future projects would be required to comply with fire protection measures in the policies and programs within the General Plan and the Municipal Code. Further, continued implementation of the Tri-Valley LHMP and review of architectural and development plans by the LFPD would assist in protecting life and property in the event of a wildfire. Additionally, implementation of General Plan goals and

¹⁵ Tetra Tech. 2018. Tri-Valley Local Hazard Mitigation Plan: Volume 1-Planning Area-Wide Elements. September. Website: <https://www.cityofpleasantonca.gov/civicax/filebank/blobdload.aspx?BlobID=35090>. Accessed March 17, 2022.

policies identified above would reduce potential impacts related to exposure to wildland fires to a less than significant level. Therefore, impacts related to exposure of people and structures to wildland fires and associated hazards, either directly or indirectly, would be less than significant.

Level of Significance

Less than significant impact.

3.8.5 - Cumulative Impacts

The geographic scope of the cumulative impact analysis for hazards and hazardous materials is the Tri-Valley Planning Area, which includes the City of Pleasanton as well as the surrounding Cities of Dublin, Livermore, and San Ramon and the Town of Danville. This analysis evaluates whether the impacts of the development consistent with the Housing Element Update, together with the impacts of cumulative development, would result in a cumulatively significant impact related to hazards and hazardous materials. This analysis then considers whether incremental contribution to cumulative impacts associated with the implementation of the Housing Element Update would be significant. Both conditions must apply for a project's cumulative effects to rise to a level of significance.

Hazards and Hazardous Materials

Cumulative projects would be subject to the applicable requirements and regulations set forth by the EPA, OSHA, USDOT, DTSC, Caltrans, CHP, local CUPA, BAAQMD, and the General Plan, including, but not limited to, Goal 5, Policy 16, Policy 17, Policy 18, and Policy 19, and Policies 17 and 19 of Chapter 5, Public Safety Element, related to transport, use, and disposal of hazardous materials. Accordingly, cumulative development would not result in physical changes that would result in a significant environmental effect. Cumulative projects would also be required to implement a SWPPP and comply with the California Code of Regulations during construction, site grading, excavation operations, and building demolition. For these reasons, cumulative projects would have a less than significant cumulative effect.

The Housing Element Update's less than significant incremental contribution to the less than significant cumulative impacts would not be cumulatively considerable. As previously discussed, the Housing Element Update itself is a policy document and would not have any direct impacts on the environment. Development consistent with the Housing Element Update would result in additional residential and commercial development within the potential sites for rezoning which could result in an increase in the routine transportation, use, and disposal of hazardous materials. As previously stated, development consistent with the Housing Element Update would be required to comply with applicable requirements and regulations set forth by the EPA, OSHA, USDOT, DTSC, Caltrans, CHP, local CUPA, BAAQMD, and the General Plan, including, but not limited to, Goal 5, Policy 16, Policy 17, Policy 18, and Policy 19, and Policies 17 and 19 of Chapter 5, Public Safety Element, related to transport, use, and disposal of hazardous materials. As discussed above, construction must comply with the California Code of Regulations and implement a SWPPP to prevent hazardous materials spills and protect public safety potential. Applications for development would be reviewed by the City for compliance with General Plan goals and policies. For these reasons, the Housing Element Update's incremental contribution to the less than significant cumulative impacts would be less than significant.

Airport Safety Hazards

Cumulative projects would be subject to the requirements and regulations set forth by the Alameda County ALUPP, Contra Costa ALUCP, and FAA related to the exposure of people residing or working in the area to a safety hazard or excessive noise. Cumulative projects would also be required to comply with General Plan policies and Municipal Code regulations related to interior noise standards and maximum building heights. For these reasons, cumulative projects would have a less than significant effect.

As previously discussed, development under the Housing Element Update would result in additional residential and commercial development within the potential sites for rezoning, which could result in an increase in the exposure of people residing or working in the area to a safety hazard or excessive noise. Potential impacts would be reduced to below a level of significance, as discussed above, because future projects would be required to comply with the policies and actions within the General Plan, including, but not limited to, Goal 6, Policy 20, and Program 20.1 of Chapter 5, Public Safety, of the General Plan, and the Municipal Code regarding interior noise standards and maximum building heights permitted under Federal Aviation regulations. Further, continued consultation with the Federal Aviation Administration (FAA) for projects located in the ALUCP AIA would minimize the exposure of people residing or working in the city to a safety hazard or excessive noise because of proximity to the Livermore Municipal Airport. Development consistent with the Housing Element Update would be required to implement all applicable policies during the design review process. As the City receives development applications for subsequent development under the Housing Element Update, those applications would be reviewed by the City for compliance with General Plan goals and policies and the Municipal Code to further reduce potential impacts related to the exposure of people residing or working in the area to a safety hazard or excessive noise. For these reasons, the Housing Element Update's incremental contribution to the less than significant cumulative impacts would be less than significant.

Emergency Response and Evacuation Plans

The LPFD, Alameda County Fire Department (ACFD), and San Ramon Valley Fire Protection District manage and maintain emergency plans and training of staff and community members within the cumulative geographic scope and focuses on activities that would prepare the community to take care of itself in the period immediately following a local disaster. For example, the community emergency response team program educates volunteers about disaster preparedness for the hazards that may impact their area and trains them in basic disaster response skills, such as fire safety, light search and rescue, team organization, and disaster medical operations. Each jurisdiction has LHMPs that are regularly updated, and each jurisdiction has emergency response plans and emergency evacuation plans. Furthermore, larger regional and statewide resource areas are regulated by State agencies to address larger-scale statewide issues. For these reasons, cumulative impacts associated with emergency response and evacuation plans are less than significant.

As the City receives development applications for subsequent development under the Housing Element Update, those applications would be reviewed by the City for compliance with the policies and goals of the General Plan Update related to emergency response plans and emergency evacuation plans. Additionally, new development under the Housing Element Update would be

considered in the context of the Tri-Valley LHMP and is not expected to impair implementation of or physically interfere with the Tri-Valley LHMP for the reasons stated within Impact HAZ-6. For these reasons, the Housing Element Update's incremental contribution to the less than significant cumulative impacts would be less than significant.

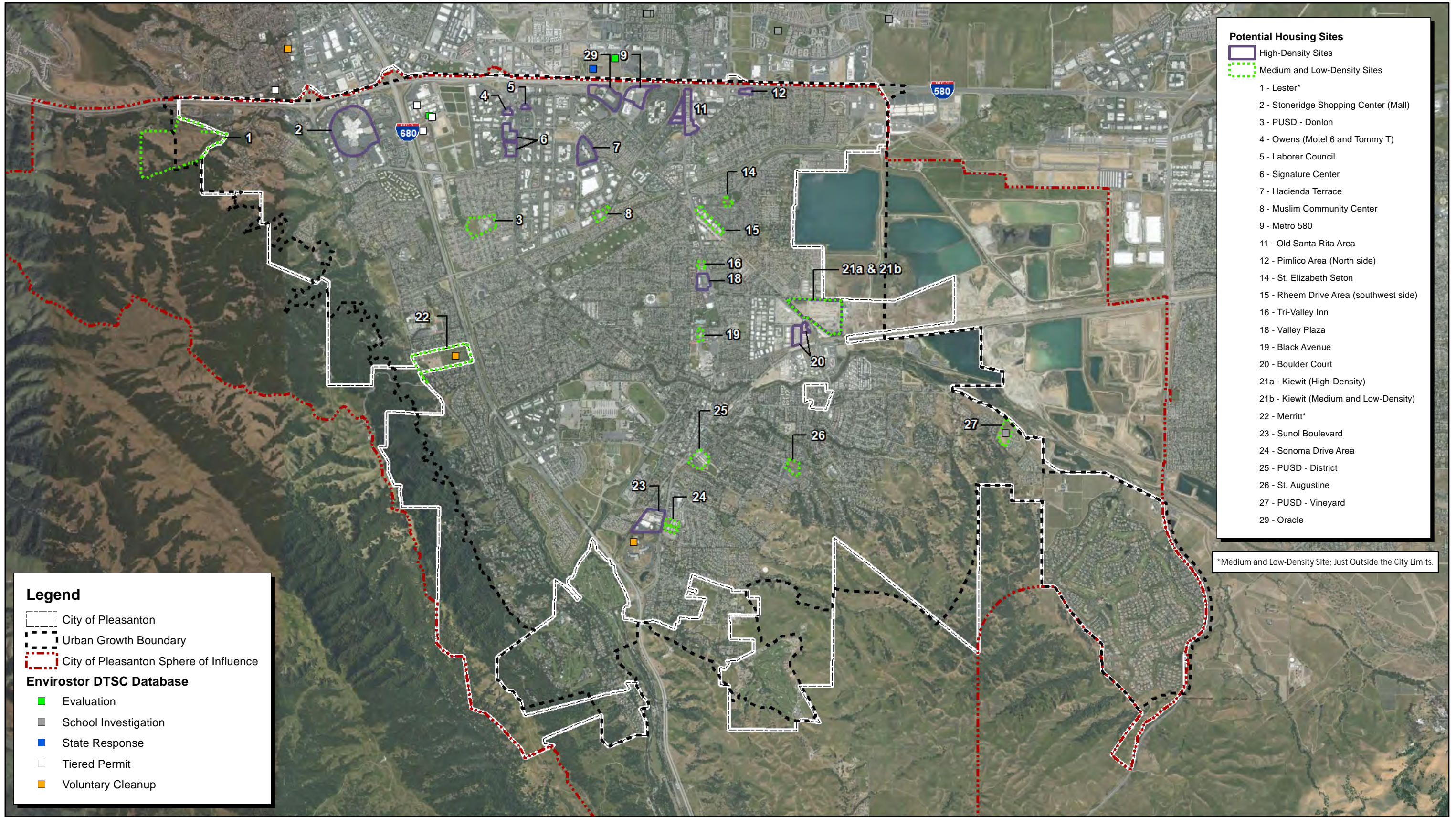
Wildland Fires

See Section 3.16, Wildfire, for a discussion of potential cumulative hazards to humans and structures from natural or human induced wildland fires.

Level of Cumulative Significance

Less than significant impact.

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- Potential Housing Sites**
- High-Density Sites
 - Medium and Low-Density Sites
- 1 - Lester*
 - 2 - Stoneridge Shopping Center (Mall)
 - 3 - PUSD - Donlon
 - 4 - Owens (Motel 6 and Tommy T)
 - 5 - Laborer Council
 - 6 - Signature Center
 - 7 - Hacienda Terrace
 - 8 - Muslim Community Center
 - 9 - Metro 580
 - 11 - Old Santa Rita Area
 - 12 - Pimlico Area (North side)
 - 14 - St. Elizabeth Seton
 - 15 - Rheem Drive Area (southwest side)
 - 16 - Tri-Valley Inn
 - 18 - Valley Plaza
 - 19 - Black Avenue
 - 20 - Boulder Court
 - 21a - Kiewit (High-Density)
 - 21b - Kiewit (Medium and Low-Density)
 - 22 - Merritt*
 - 23 - Sunol Boulevard
 - 24 - Sonoma Drive Area
 - 25 - PUSD - District
 - 26 - St. Augustine
 - 27 - PUSD - Vineyard
 - 29 - Oracle

*Medium and Low-Density Site; Just Outside the City Limits.

Legend

- City of Pleasanton
- Urban Growth Boundary
- City of Pleasanton Sphere of Influence

Envirostor DTSC Database

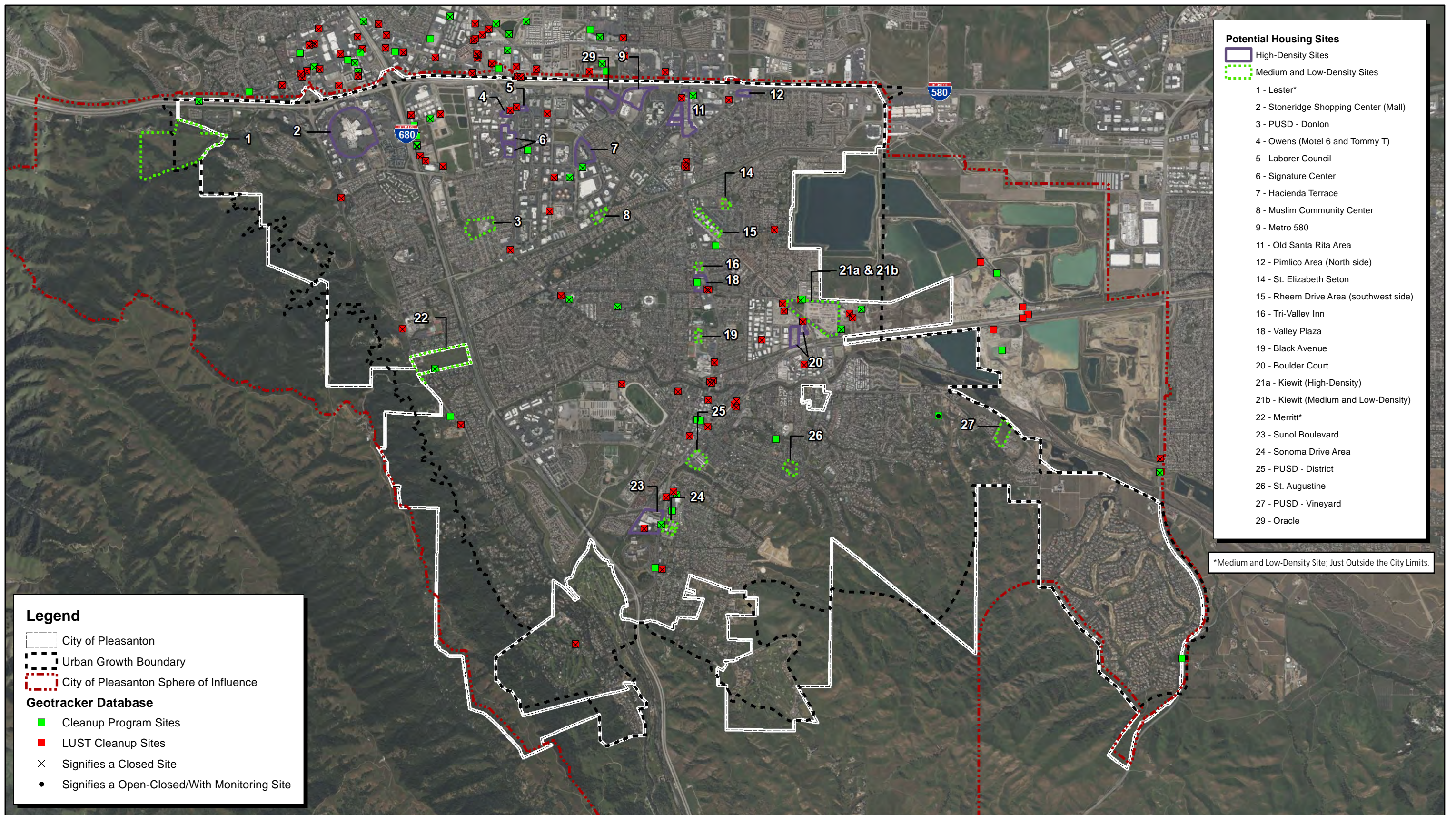
- Evaluation
- School Investigation
- State Response
- Tiered Permit
- Voluntary Cleanup

Source: Bing Aerial Imagery, City of Pleasanton, Envirostor Database



Exhibit 3.8-1a
Properties in the Vicinity of and Within Potential
Sites for Rezoning on the Cortese List, DTSC

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- Potential Housing Sites**
- High-Density Sites
 - Medium and Low-Density Sites
- 1 - Lester*
 - 2 - Stoneridge Shopping Center (Mall)
 - 3 - PUSD - Donlon
 - 4 - Owens (Motel 6 and Tommy T)
 - 5 - Laborer Council
 - 6 - Signature Center
 - 7 - Hacienda Terrace
 - 8 - Muslim Community Center
 - 9 - Metro 580
 - 11 - Old Santa Rita Area
 - 12 - Pimlico Area (North side)
 - 14 - St. Elizabeth Seton
 - 15 - Rheem Drive Area (southwest side)
 - 16 - Tri-Valley Inn
 - 18 - Valley Plaza
 - 19 - Black Avenue
 - 20 - Boulder Court
 - 21a - Kiewit (High-Density)
 - 21b - Kiewit (Medium and Low-Density)
 - 22 - Merritt*
 - 23 - Sunol Boulevard
 - 24 - Sonoma Drive Area
 - 25 - PUSD - District
 - 26 - St. Augustine
 - 27 - PUSD - Vineyard
 - 29 - Oracle

*Medium and Low-Density Site: Just Outside the City Limits.

Legend

- City of Pleasanton
- Urban Growth Boundary
- City of Pleasanton Sphere of Influence

Geotracker Database

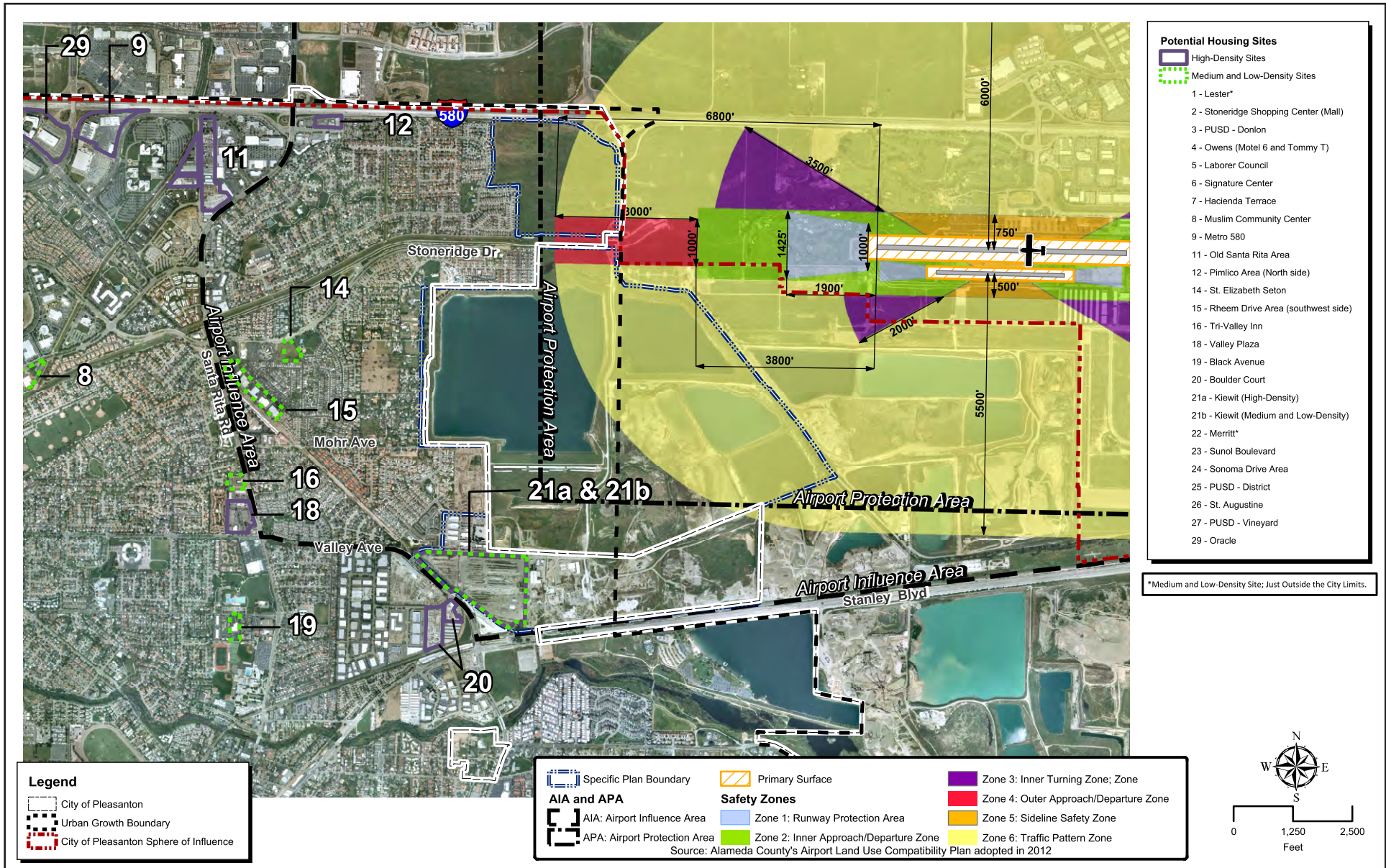
- Cleanup Program Sites
- LUST Cleanup Sites
- × Signifies a Closed Site
- Signifies a Open-Closed/With Monitoring Site

Source: Bing Aerial Imagery, City of Pleasanton, GeoTracker Database



Exhibit 3.8-1b
Properties in the Vicinity of Potential Sites for
Rezoning on the Corteste List, Geotracker

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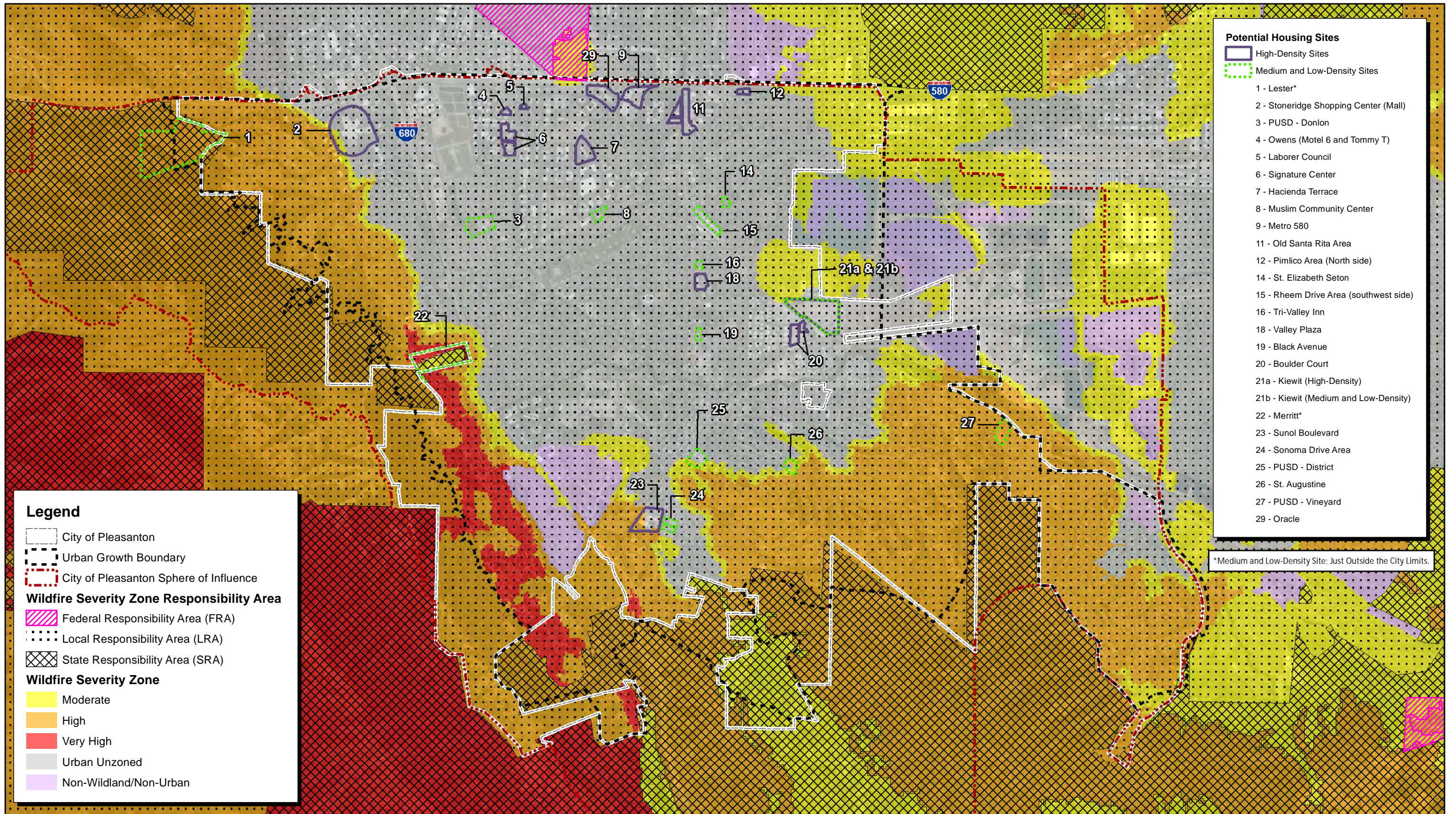


Source: City of Pleasanton 2005 General Plan 2025.



Exhibit 3.8-2 Alameda County ALUPP Airport Influence Area

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Source: Bing Aerial Imagery, City of Dublin, City of Livermore, City of Pleasanton, CalFIRE, USDA



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3.9 - Hydrology and Water Quality

3.9.1 - Introduction

This section of the Draft Program Environmental Impact Report (Draft Program EIR) describes the existing hydrology, drainage, flooding, water quality, and groundwater underlying the potential sites for rezoning. This section evaluates impacts related to hydrology and water quality resulting from implementation of the proposed 2023-2031 (6th Cycle) Housing Element Update, rezonings, General Plan and Specific Plan Amendments (collectively referred to herein as the Housing Element Update). Future projects consistent with the Housing Element Update would be evaluated for project-specific impacts related to hydrology and water quality at the time they are proposed. The descriptions and analysis in this section are based, in part, on statements, data, and figures provided by the City of Pleasanton General Plan (General Plan) and City of Pleasanton Municipal Code (Municipal Code).

Water supply and wastewater conveyance and treatment are discussed in Section 3.15, Utilities and Service Systems. Issues regarding wetlands and waters of the United States are discussed in Section 3.3, Biological Resources.

Once the Housing Element Update is adopted, the General Plan would be amended to include the Housing Element Update. Therefore, all references to the General Plan include the Housing Element Update.

3.9.2 - Environmental Setting

Surface Hydrology

Watershed

The City of Pleasanton (City) lies within the Eastern Alameda Creek watershed, a drainage basin encompassing about 675 square miles between Mount Hamilton and Mount Diablo. Each stream, tributary, and reservoir within this area has its own smaller watershed that ultimately feeds into Alameda Creek. Alameda Creek flows northwest from its origin on Mount Hamilton until it meets the Arroyo de la Laguna near Sunol and then runs west through Niles Canyon to San Francisco Bay. The Arroyo de la Laguna collects the surface water runoff from the Tri-Valley and carries it south to Alameda Creek.¹

The Alameda County Flood Control and Water Conservation District Zone 7 (Zone 7) is responsible for providing water and flood control to the Livermore-Amador Valley. The actual source of the Zone 7 water depends upon the time of year and rainfall levels and is made up of a blend of different sources, including the following:

- **State Water Project:** The State Water Project is a system of reservoirs, canals, pipelines, and pump stations that transport water throughout California.
- **Local Surface Water and Groundwater:** Local surface water comes from rain runoff in the watershed that flows into the Del Valle Reservoir from the surrounding hills and valley, where

¹ City of Pleasanton. 2005. Proposed Pleasanton General Plan 2005-2025 Draft Environmental Impact Report, Hydrology Overview.

it is stored for later use. Groundwater comes from the Livermore-Amador Valley groundwater basin through groundwater recharge. Water naturally percolates into the basin from rainfall and stream flow within the watershed. Extra surface water is also sometimes stored in the groundwater basin. Most of the basin recharge comes from water that percolates down into the ground as it flows through the arroyos. Zone 7 stores surface water in the groundwater basin each winter and pumps that water back out each summer to supplement other supplies to meet demands.

- **Supplemental Water:** Zone 7 also purchases water from Byron Bethany Irrigation District.

Surface Water

The city is in the Livermore planning watershed of the Alameda Creek Hydrologic Subarea, in the South Bay Hydrologic Unit in Alameda County. The Alameda Creek watershed covers an area of 633 square miles. There are several seasonal and perennial surface water bodies within this subarea, as described below and shown in Exhibit 2-2 in Chapter 2, Project Description.

Arroyo las Positas

The Arroyo las Positas is a major drainage feature of the Livermore Valley and drains approximately 51,000 acres. Summer flows are a combination of irrigation, urban flows, and agricultural runoff, all of which keep the Arroyo las Positas as a perennial creek. The Arroyo las Positas begins in the Altamont Hills east of Livermore and flows westward to its confluence with the Arroyo Mocho.

Tassajara Creek

Tassajara Creek flows from north to southwest, through the City of Dublin, crossing under Interstate 580 (I-580) into the City of Pleasanton at Old Santa Rita Road. After continuing under I-580, Tassajara Creek flows for approximately 1 mile south before reaching its confluence with the Arroyo Mocho. South of I-580, Tassajara Creek flows are maintained by shallow groundwater aquifer seepage into the stream channel.

Arroyo Mocho

The Arroyo Mocho flows in an east to west and northwest direction through the Chain of Lakes area, then turns in a southwesterly direction west of El Charro Road to its confluence with the Alamo Canal near I-680. The channel is trapezoidal in shape, with levees along its upper length within the watershed. The Arroyo Mocho drains approximately 36,000 acres (56.2 square miles) of mixed agriculture, urban, and undeveloped lands starting in Santa Clara County, where it flows generally to the northwest. Because of the regional Mediterranean climate, flow within the Arroyo Mocho is variable; summer flows are low and often depend upon releases from Zone 7 storage facilities for groundwater recharge to the Chain of Lakes system. This arroyo may run dry during the summer.

Alamo Canal and South San Ramon Creek

Alamo Canal is a trapezoidal flood control channel that carries flows from South San Ramon Creek and Alamo Creek (north of Pleasanton in the cities of San Ramon and Dublin) into the Arroyo de la Laguna. This canal runs for approximately 3 miles from the Interstate 680 (I-680)/I-580 interchange, parallel to I-680. This is notated as South San Ramon Creek on Exhibit 2-2 in Chapter 2, Project Description.

Arroyo del Valle

The Arroyo del Valle is an unchannelized stream that originates at the Del Valle Reservoir and flows west through unincorporated Alameda County and Shadow Cliffs Regional Recreation Area and continues to meander through the City of Pleasanton to its confluence with the Arroyo de la Laguna and Alamo Canal. A distinctive riparian corridor is present on both sides of the stream channel.

Chain of Lakes

The Chain of Lakes is a series of former gravel pits that are currently being improved for stormwater retention/flood control and groundwater recharge. Water from the Arroyo Mocho is released periodically into the Chain of Lakes area. The Arroyo Mocho flows through the Tri-Valley and near the Chain of Lakes but is separated from it by levees. Surface water does not flow out of the Chain of Lakes area; thus, the area is not considered part of the Arroyo Mocho Watershed.²

Surface Water Quality

Both Zone 7 and the City operate extensive water quality monitoring programs that the agencies have continually updated and refined over the last decade. Neither agency has detected any significant levels of volatile organic compounds (VOC) or contaminants in the water supply. In addition, Pleasanton's water quality complies with all federal and State drinking water quality standards.

The San Francisco Bay Regional Water Quality Control Board (RWQCB) has characterized the Arroyo de la Laguna, Arroyo las Positas, Arroyo del Valle, Arroyo Mocho, and Alameda Creek as impaired by diazinon. Diazinon is a pesticide used on a variety of agricultural crops and formerly used on residential gardens and lawns. As of December 31, 2004, the United States Environmental Protection Agency (EPA) no longer permitted its sale for nonagricultural uses. Because of the ban, the diazinon levels in the creeks entering the Bay have diminished.³

The Lower San Francisco Bay is listed as impaired by chlordane, DDT, dieldrin, and mercury from nonpoint sources; by dioxin compounds, furan compounds, and mercury from atmospheric deposition; by exotic species from ballast water; and by polychlorinated biphenyls (PCBs) and dioxin-like PCBs from unknown nonpoint sources. Industrial and municipal point sources, resource extraction, and natural sources contribute to mercury degradation of the Lower San Francisco Bay.

The Zone 7 Surface Water Monitoring Program measured water quality within the Arroyo Mocho in June 2005. Table 3.6-1 of the General Plan lists concentrations of various constituents at monitoring sites from testing dates in 2005 as well as the applicable water quality criteria/regulations for surface water resources. Although water quality criteria are long-term thresholds rather than single measurement criteria, this information serves as an indicator of possible impairments. Constituents exceeding regulatory thresholds on the sampling dates included total dissolved solids, chloride, and nitrates.⁴

² City of Pleasanton. 2005. Proposed Pleasanton General Plan 2005-2025. Draft Environmental Impact Report, Hydrology Overview.

³ City of Pleasanton. 2005. 2005 Pleasanton General Plan 2025. Chapter 8 Water Element, Water Quality.

⁴ City of Pleasanton. 2005. Proposed Pleasanton General Plan 2005-2025. Draft Environmental Impact Report, Surface Water Drainage.

The Dublin San Ramon Services District (DSRSD) treats and monitors the City's sewage effluent by contract. The sewage treatment plant produces secondary effluent, which is pumped to the San Francisco Bay; tertiary effluent (also known as grey water), which is used primarily for landscape watering in commercial areas in the City of Dublin, as well as commercial landscaping and some public parks in Pleasanton; and sludge, which is decomposed and then buried nearby in the drying beds north of Stoneridge Drive. DSRSD monitors secondary effluent daily and monitors the sewage transport system for pH levels (a measure of acidity or alkalinity) and hydrogen sulfide. At its sewage ponds site, DSRSD operates numerous test wells that have shown no toxic material intrusion on the soil content.⁵

Local Drainage

The storm drainage system is composed of curb inlets, pipes, and natural swales that carry runoff to flood control channels known as arroyos. Drainage features would be evaluated on a site-by-site basis as the potential sites for rezoned are developed in the future.

Groundwater

The city is located above the Livermore Valley Groundwater Basin. The general groundwater gradient is to the west, then south toward the Arroyo de la Laguna. Elevations within the basin range from about 600 feet above mean sea level in the east, near the Altamont Hills, to about 280 feet above mean sea level in the southwest, where the Arroyo de la Laguna flows into the Sunol Groundwater Basin area. The basin surface area is approximately 69,600 acres (108.8 square miles) and extends from the Altamont Hills and Greenville fault to the east to the Pleasanton and Main Ridges as well as the Calaveras fault on the west, and from the Orinda Upland south to the Livermore Upland fault. The two major faults, the San Andreas and Hayward Faults, prevent lateral groundwater movement. The basin storage capacity is estimated at approximately 500,000 acre-feet.

This groundwater basin is divided into two major basins, based on geophysical properties: the Main Basin and Fringe Basin. These sources of groundwater co-mingle in the Bernal and Amador Subbasin, and generally flow toward municipal or gravel mining company groundwater pumping wells. The southeastern region of the Livermore Valley is the most important groundwater recharge area and consists of mainly sand and gravel that was deposited by the ancestral Tulare Lake and current Arroyo del Valle and Arroyo Mocho.

Although all creeks feeding the Arroyo de la Laguna are naturally seasonal, Zone 7 releases both stored water from the Del Valle Reservoir and imported water from the South Bay Aqueduct into these creeks. These controlled water releases recharge the local groundwater basin underlying the potential sites for rezoning.

The groundwater basin includes several aquifers consisting of water-bearing gravel layers separated by impervious clay layers. Directly under flat portions of the city sits the greatest amount of usable groundwater in the main water basin.

⁵ City of Pleasanton. 2005. 2005 Pleasanton General Plan 2025. Chapter 8 Water Element.

Groundwater Depth

The depth to groundwater ranges between approximately 22 and 67 feet below ground surface, depending upon the groundwater subbasin.

Groundwater Quality

The Main Basin is characterized by relatively good quality groundwater that meets all State and federal drinking water standards with only minimal treatment (chlorination to preserve quality in the distribution system). In general, the quality of water in the central portion of the Main Basin varies from fair to excellent. A number of wells are located within this area because of the potable quality of its water. The total dissolved solids content in the central portion of the Main Basin averages about 400 to 700 milligrams per liter. The Main Basin supports large-capacity municipal production wells and is used to store and distribute high-quality imported water through Zone 7's recharge program.

The groundwater in the Fringe Basin tends to be saltier than the Main Basin. Zone 7 has developed a salt management plan to identify and evaluate all significant salt loading to, and removal from, the groundwater basin. The Zone 7 monitoring indicates that groundwater used for potable water supplies meets regulatory goals for drinking water including those for arsenic, total chromium VI, chloride, total dissolved solids, hardness, chloramines, free ammonia, total trihalomethanes, and five haloacetic acids. Zone 7 has identified recharge of local streamflow and imported water, subsurface inflow, and irrigation returns as major contributors to increasing total dissolved solids (TDS) concentration. TDS in the local surface water varies significantly throughout the watershed from approximately 350 milligrams per liter (mg/l) TDS to more than 1,000 mg/l. The highest-quality surface water recharging the basin occurs through the Arroyo Mocho and Arroyo del Valle where the TDS is generally less than 500 mg/l. The poorest quality surface water recharging the basin has a TDS of approximately 1,000 mg/l and occurs in the Arroyo las Positas. Localized elevated groundwater nitrate levels are associated with livestock operations and septic tank usage in the central and eastern portions of the Livermore Valley.

Per- and Polyfluoroalkyl Substances

Per- and polyfluoroalkyl substances (PFAS) are a group of thousands of chemicals used since the 1940s to make commercial products including carpets, clothing, food packaging, and cookware because they are waterproof, stain-resistant, and non-stick; they also have been used in fire-retarding foam and various industrial processes. They can be introduced into the body through ingestion of contaminated food or liquid and inhaling or touching products with packaging treated with the substance. They can contaminate drinking water supplies when products containing PFAS are used or spilled on the ground and they migrate into groundwater, and, once in groundwater, PFAS can travel large distances and contaminate drinking water wells.

In March 2019, the California State Water Resources Control Board (State Water Board) initiated a statewide PFAS phased investigation for hundreds of drinking water sources, including Zone 7 and the City of Pleasanton. The City has three groundwater supply wells, Wells 5, 6, and 8. The test results showed detection of contaminants above the Response Level for Well 8, and, upon receipt of

these results, the City placed Well 8 on Emergency Standby Status and Well 8 has not been operated since the beginning of June 2019.⁶

In September 2020, the City approved a work plan to remediate PFAS present at the City's groundwater wells, and the work plan included the establishment of the PFAS Treatment and Wells Rehabilitation Project.⁷ The PFAS Treatment and Wells Rehabilitation Project is currently paused as described in more detail in Section 3.15, Utilities and Service Systems.

It has since been determined that all groundwater supply wells for the city may be taken out of commission no later than the first quarter of 2023. Currently, groundwater makes up approximately 20 percent of the total water supply for the City, and, if the existing groundwater supply wells are taken out of commission, this 20 percent will not be available to the City without treatment or additional supply sources. This reduction in available groundwater is particularly important as it affects water supply availability for the Housing Element Update and any planned additional growth. The City is currently considering several options to account for the loss of water supply, including PFAS treatment and wells rehabilitation and additional purchases from Zone 7. As of the date of this Draft Program EIR, the City is evaluating options, as described in more detail in Section 3.15, Utilities and Service Systems, but no specific alternative supply source has been identified.

Flooding and Inundation

Flooding

The City's storm drainage system primarily consists of underground pipes, local channels, and natural swales in hillside areas. These facilities carry water runoff within the drainage basin to the flood control channels and creeks (known locally as arroyos). Developers of new projects are required to install on-site stormwater treatment infrastructure such as bioswales and bioretention basins in compliance with Provision C.3.g "Hydromodification Management" of Municipal Regional Stormwater NPDES Permit No. CAS612008, as well as adequately sized storm drains to connect to the City's existing underground storm drain network. The City also requires that hillside projects protect natural drainage courses and install silt basins/retention ponds for controlling pollutants and the runoff-flow rate. The City has required new developments to size their storm drains to accommodate major rainfalls.

As part of the National Flood Insurance Program (NFIP), the Federal Emergency Management Agency (FEMA) conducts nationwide flood hazard mapping to identify flood-prone areas and to reduce flood damages. The maps identify the flood of that magnitude that have a 1 percent annual chance of being equaled or exceeded, called the "100-year flood." The flood elevation associated with the 1 percent chance event is referred to as the base flood elevation. Areas predicted to be inundated in a 1 percent chance event are delineated on the Flood Insurance Rate Map (FIRM) and commonly referred to as the "100-year floodplain." Buildings and other structures in the 100-year flood plain must meet certain requirements to receive a floodplain development permit and to qualify for NFIP insurance and federally backed mortgages, and the Municipal Code has been regularly updated to

⁶ City of Pleasanton. 2022. PFAS FAQ. Website: https://admin.cityofpleasantonca.gov/gov/depts/os/water_quality/pfos_and_pfoa.asp. February 8. Accessed August 25, 2022.

⁷ City of Pleasanton. 2022. PFAS Treatment and Wells Rehab Project. Website: https://www.cityofpleasantonca.gov/gov/depts/os/water_quality/pfas_project.asp. Accessed August 25, 2022.

reflect some of these evolving construction requirements (see Chapter 17.08 Flood Damage Prevention)

Most of the potential sites for rezoning are not located within a flood hazard zone, as shown in Exhibit 3.9-1. Site 3 (PUSD-Donlon), 4 (Owens), 5 (Laborers Council), 6 (Signature Center), the southwestern portion of Site 7 (Hacienda Terrace), and the western portion of Sites 22 (Merritt) and 29 (Oracle) are within the 500-year FEMA flood hazard zone. None of the potential sites for rezoning are within the 100-year FEMA flood hazard zone. A small portion of the northwestern portion of the city, within and surrounding the Chain of Lakes, is within the 500-year FEMA flood hazard zone, as well as land on either side of the Arroyo Valle traversing the city from east to west and land to the east and west of I-680.

Dam Inundation

Most of the city falls within the 5- to 40- minute inundation area in the event of a Del Valle Dam failure. In 2002, the City adopted an evacuation plan as an amendment to its Comprehensive Emergency Management Plan. It is unlikely that the Del Valle Dam will fail and result in the predicted inundation scenario. The Del Valle Dam failure inundation study, conducted in 1974, was likely performed using the worst-case situation: the situation where the dam failed from top to bottom when the reservoir was at capacity. A full reservoir could only occur during the 500-year storm event because the Del Valle Dam reservoir system was designed for up to the 500-year storm event.

The Department of Water Resources continually monitors all State Water Project facilities and performs repairs and modifications as necessary to ensure safe, reliable, water delivery. Engineers from the Division of Safety of Dams review instrumentation data and inspect jurisdictional State Water Project dams either semi-annually or annually. They evaluate proposed modifications to existing dams as well as the design and construction of new jurisdictional dams. The Del Valle Dam is a State Water Project facility and is inspected yearly by Operations and Maintenance and the Division of Safety of Dams.

3.9.3 - Regulatory Framework

Federal

Clean Water Act

The Clean Water Act (CWA) (33 United States Code [USC] § 1251, *et seq.*) is the major federal legislation governing the water quality aspects of construction and operation of development consistent with the Housing Element Update. The CWA established the basic structure for regulating discharges of pollutants into waters of the United States (not including groundwater) and waters of the State. The objective of the CWA is “to restore and maintain the chemical, physical, and biological integrity of the nation’s waters.” The CWA establishes the basic structure for regulating the discharge of pollutants into waters of the United States.

The CWA authorizes the EPA to implement pollution control programs. Under the CWA, it is unlawful for any person to discharge any pollutant from a point source into navigable waters, unless a National Pollutant Discharge Elimination System (NPDES) permit is obtained. In addition, the CWA requires each state to adopt water quality standards for receiving water bodies and to have those

standards approved by the EPA. Water quality standards consist of designated beneficial uses for a particular receiving water body (e.g., wildlife habitat, agricultural supply, fishing), along with water quality objectives necessary to support those uses.

Responsibility for protecting water quality in California resides with the State Water Board and nine RWQCBs. The State Water Board establishes Statewide policies and regulations for the implementation of water quality control programs mandated by federal and State water quality statutes and regulations. The RWQCBs develop and implement water quality control plans (basin plans) that consider regional beneficial uses, water quality characteristics, and water quality problems. Water quality standards applicable to the Housing Element Update are listed in the San Francisco Bay's (Region 2) RWQCB's Basin Plan.

Section 303—Water Quality Standards and Total Maximum Daily Loads

Section 303(c)(2)(b) of the CWA requires states to adopt water quality standards for all surface waters of the United States based on the water body's designated beneficial use. Where multiple uses exist, water quality standards must protect the most sensitive use. Water quality standards are typically numeric, although narrative criteria based on biomonitoring methods may be employed where numerical standards cannot be established or where they are needed to supplement numerical standards.

CWA Section 303(d) requires states and authorized Native American tribes to develop a list of water quality-impaired segments of waterways. The list includes waters that do not meet water quality standards necessary to support a waterway's beneficial uses even after the minimum required levels of pollution control technology have been installed. Listed water bodies are to be priority ranked for development of a total maximum daily load (TMDL). The TMDL is a calculation of the total maximum daily load (amount) of a pollutant that a water body can receive daily and still safely meet water quality standards. TMDLs include waste load allocations for urban stormwater runoff as well as municipal and industrial wastewater discharges, with allocations apportioned for individual Municipal Separate Storm Sewer Systems (MS4s) and wastewater treatment plants, including those in Alameda County. For stormwater, load reductions would be required to meet the TMDL waste load allocations within the 20 years required by the TMDLs.

The State Water Board, RWQCBs, and EPA are responsible for establishing TMDL waste load allocations and incorporating approved TMDLs into water quality control plans, NPDES permits, and waste discharge requirements (WDRs) in accordance with a specified schedule for completion.

Section 401—Water Quality Certification

Section 401 of the CWA requires compliance with State water quality standards for actions within State waters. Under CWA Section 401, an applicant for a Section 404 permit (to discharge dredged or fill material into waters of the United States) must first obtain a certificate from the appropriate agency stating that the fill is consistent with the State's water quality standards and criteria. In California, the State Water Board delegates authority to either grant water quality certification or waive the requirements to the nine RWQCBs. The San Francisco Bay RWQCB is the applicable water quality control board for the Housing Element Update.

Section 402—National Pollution Discharge Elimination System Permits

The RWQCBs administer the NPDES stormwater permitting program, under Section 402(d) of the federal CWA, on behalf of EPA. The objective of the NPDES program is to control and reduce levels of pollutants in water bodies from discharges of municipal and industrial wastewater and stormwater runoff. CWA Section 402(d) establishes a framework for regulating nonpoint-source stormwater discharges (33 USC 1251). Under the CWA, discharges of pollutants to receiving water are prohibited unless the discharge complies with an NPDES permit. The NPDES permit specifies discharge prohibitions, effluent limitations, and other provisions, such as monitoring deemed necessary to protect water quality based on criteria specified in the National Toxics Rule (NTR), the California Toxics Rule (CTR), and the Basin Plan. The NPDES Permit for the San Francisco Bay Area is NPDES Permit No. CAS612008, which was recently updated by Order No. R2-2022-0018.⁸

Discharge prohibitions and limitations in an NPDES permit for wastewater treatment plants are designed to maintain public health and safety, protect receiving water resources, and safeguard the water's designated beneficial uses. Discharge limitations typically define allowable effluent quantities for flow, biochemical oxygen demand, total suspended matter, residual chlorine, settleable matter, total coliform, oil and grease, pH, and toxic pollutants. Limitations also typically encompass narrative requirements regarding mineralization and toxicity to aquatic life. Under the NPDES permits issued to the city/county to operate the treatment plants, the city/county is required to implement a pretreatment program. This program must comply with the regulations incorporated in the CWA and the General Pretreatment Regulations (Code of Federal Regulations [CFR] Title 40, Part 403 [40 CFR 403]).

Section 401—Water Quality Certification

Section 404 of the CWA regulates temporary and permanent fill and disturbance of wetlands and waters of the United States. Under Section 404, the discharge (temporary or permanent) of dredged or fill material into waters of the United States, including wetlands, typically must be authorized by the United States Army Corps of Engineers (USACE) through either the Nationwide Permit (general categories of discharges with minimal effects) or the Individual Permit.

River and Harbors Act Section 10

Section 10 of the Rivers and Harbors Act of 1899 requires that regulated activities conducted below the ordinary high-water elevation of navigable waters of the United States be approved and permitted by the USACE. Regulated activities include the placement or removal of structures, work involving dredging, disposal of dredged material, filling, excavation, or any other disturbance of soils/sediments or modification of a navigable waterway. Navigable waters of the United States are those waters of the United States that are subject to the ebb and flow of the tide shoreward to the mean high-water mark and/or are presently used, or have been used in the past, or may be susceptible to use, to transport interstate or foreign commerce. Section 10 also regulates tributaries and backwater areas that are associated with navigable waters of the United States and are located below the ordinary high-water elevation of the adjacent navigable waterway.

⁸ California State Water Resources Control Board (State Water Board). 2022. San Francisco Bay Region Municipal Regional Stormwater NPDES Permit: Order No. R2-2022-0018, NPDES Permit No. CAS612008.

A project proponent can apply for a permit/letter of permission for work regulated under Section 404 (CWA) and Section 10 (Rivers and Harbors Act) by completing and submitting one application form. An application for a USACE permit will serve as an application for both Section 404 and Section 10 permits.

Federal Antidegradation Policy

The federal antidegradation policy is designed to protect existing water uses, water quality, and national water resources. The federal policy directs states to adopt a Statewide policy that includes the following primary provisions:

- Existing instream uses and the water quality necessary to protect those uses shall be maintained and protected.
- Where existing water quality is better than necessary to support fishing and swimming conditions, that quality shall be maintained and protected unless the state finds that allowing lower water quality is necessary for important local economic or social development.
- Where high-quality waters constitute an outstanding national resource, such as waters of national and state parks, wildlife refuges, and waters of exceptional recreational or ecological significance, that water quality shall be maintained and protected.

National Toxics Rule and California Toxics Rule

In 1992, the EPA promulgated the NTR under the CWA to establish numeric criteria for priority toxic pollutants for 14 states to bring all states into compliance with the requirements of CWA Section 303(c)(2)(B). The NTR established water quality standards for 42 pollutants not covered under California's Statewide water quality regulations at that time. As a result of the court-ordered revocation of California's Statewide basin plans in September 1994, the EPA initiated efforts to promulgate additional federal water quality standards for California. In May 2000, the EPA issued the CTR, which includes all the priority pollutants for which the EPA has issued numeric criteria not included in the NTR.

Executive Order 1198

Executive Order 11988, "Floodplain Management," directs all federal agencies to avoid, to the extent possible, long- and short-term adverse impacts of occupancy and modification of floodplains, and to avoid supporting development in a floodplain either directly or indirectly wherever there is a practicable alternative. Compliance requirements are outlined in 23 Code of Federal Regulations 650, Subpart A, "Location and Hydraulic Design of Encroachment on Floodplains."

If a project involves significant encroachment into the floodplain, the final environmental document must include:

- The reasons why the proposed action must be located in the floodplain,
- Alternatives considered and the reasons they were not practicable, and
- A statement indicating whether the action conforms to applicable state or local floodplain protection standards.

National Flood Insurance Act of 1968 and the Flood Disaster Protection Act of 1973

The National Flood Insurance Act of 1968 and the Flood Disaster Protection Act of 1973 were enacted to reduce the need for flood protection structures and limit disaster relief costs by restricting development in floodplains. FEMA, established in 1979, is responsible for predicting hazards from flooding events and forecasting the level of inundation under various conditions. As part of its duty to develop standards for delineating fluvial and coastal floodplains, FEMA provides information on FIRMs about the potential for flood hazards and inundation and, where appropriate, designates regions as special flood hazard areas. Special flood hazard areas are defined as areas that have a 1 percent chance of flooding in a given year.

National Flood Insurance Program

As part of the NFIP, FEMA conducts nationwide flood hazard mapping to identify flood-prone areas and to reduce flood damages. The maps identify the flood of that magnitude that have a 1 percent annual chance of being equaled or exceeded, called the “100-year flood.” The NFIP also enables property owners in participating communities to purchase insurance as protection against flood losses in exchange for State and community floodplain management regulations that reduce future flood damages.

State

Porter-Cologne Water Quality Control Act

The Porter-Cologne Water Quality Control Act of 1969 (Porter-Cologne Act) is California’s statutory authority for the protection of water quality. Under the Porter-Cologne Act, the State must adopt water quality policies, plans, and objectives that protect the State’s waters for the use and enjoyment of the people. Regional authority for planning, permitting, and enforcement is delegated to the nine RWQCBs. The RWQCBs are required to formulate and adopt basin plans for all areas in the region and establish water quality objectives in the plans. The Porter-Cologne Act sets forth the obligations of the State Water Board and RWQCBs to adopt and periodically update basin plans. The San Francisco Bay RWQCB is the applicable water quality control board for the Housing Element Update.

Basin plans are the regional water quality control plans required by both the CWA and the Porter-Cologne Act that establish beneficial uses, water quality objectives, and implementation programs for each of the nine regions in California. The Porter-Cologne Act also requires waste dischargers to notify the RWQCBs of their activities by filing reports of waste discharge and authorizes the State Water Board and RWQCBs to issue and enforce WDRs, NPDES permits, CWA Section 401 water quality certifications, or other approvals. The RWQCBs are also authorized to issue waivers to reports of waste discharge and WDRs for broad categories of “low threat” discharge activities that have minimal potential to cause adverse water quality effects when implemented according to prescribed terms and conditions.

California Code of Regulations (Wetlands and Waters Definition)

The State Water Board indicates that no single accepted definition of wetlands exists at the State level and that the RWQCBs may have different requirements and levels of analysis regarding the

issuance of water quality certifications. According to the State Water Board, an area is a wetland if, under normal circumstances:⁹

- (1) the area has continuous or recurrent saturation of the upper substrate caused by groundwater, or shallow surface water, or both;
- (2) the duration of such saturation is sufficient to cause anaerobic conditions in the upper substrate; and
- (3) the area's vegetation is dominated by hydrophytes or the area lacks vegetation.¹⁰

Under California State law, waters of the State mean "any surface water or groundwater, including saline waters, within the boundaries of the state." As such, water quality laws apply to both surface water and groundwater. After the U.S. Supreme Court decision in *Solid Waste Agency of Northern Cook County v. U.S. Army Corps of Engineers* (53 USC 159), the Office of Chief Counsel of the State Water Board released a legal memorandum confirming the State's jurisdiction over isolated wetlands. The memorandum stated that under the Porter-Cologne Act, discharges to wetlands and other waters of the State are subject to State regulation, and this includes isolated wetlands. In general, the State Water Board regulates discharges to isolated waters in much the same way as it does for waters of the United States, using the Porter-Cologne Act rather than CWA authority.

National Pollutant Discharge Elimination System

The NPDES permits all involve similar processes, which include submitting notices of intent for discharging to water in areas under the San Francisco Bay RWQCB's jurisdiction and implementing Best Management Practices (BMPs) to minimize those discharges. The San Francisco Bay RWQCB may also issue site-specific WDRs, or waivers to WDRs, for certain waste discharges to land or waters of the State.

Construction Activity

The State Water Board stormwater general permit for construction activity (Order 2009-009-DWQ, as amended by Order Nos. 2010-0014-DWQ and 2012-0006-DWQ) applies to all construction activities that would disturb 1 acre of land or more. Construction activities subject to the general construction activity permit include clearing, grading, stockpiling, and excavation. Dischargers are required to eliminate or reduce non-stormwater discharges to storm sewer systems and other waters.

Through the NPDES and WDR processes, the State Water Board seeks to ensure that the conditions at a project site during and after construction do not cause or contribute to direct or indirect impacts on water quality (i.e., pollution and/or hydromodification) upstream and downstream. To comply with the requirements of the Construction General Permit, the project applicant must file a Notice of

⁹ Normal circumstances are the soil and hydrologic conditions that are normally present, without regard to whether the vegetation has been removed. The determination of whether normal circumstances exist in a disturbed area involves an evaluation of the extent and relative permanence of the physical alteration of wetland hydrology and hydrophytic vegetation, and consideration of the purpose and cause of the physical alterations to hydrology and vegetation.

¹⁰ California State Water Resources Control Board (State Water Board). 2021. State Policy for Water Quality Control: State Wetland Definition and Procedures for Discharges of Dredged or Fill Material to Waters of the State. Adopted April 2, 2019, and Revised April 6, 2021. Website: https://www.waterboards.ca.gov/water_issues/programs/cwa401/wrapp.html. Accessed: June 1, 2022.

Intent (NOI) with the State Water Board to obtain coverage under the permit; prepare a Storm Water Pollution Prevention Plan (SWPPP); and implement inspection, monitoring, and reporting requirements appropriate to the project's risk level as specified in the SWPPP. The SWPPP includes a site map, describes construction activities and potential pollutants, and identifies BMPs that will be employed to prevent soil erosion and discharge of other construction-related pollutants that could contaminate nearby water resources, such as petroleum products, solvents, paints, and cement. The permit also requires the discharger to consider using post-construction permanent BMPs that will remain in service to protect water quality throughout the life of the project. All NPDES permits also have inspection, monitoring, and reporting requirements.

Industrial General Stormwater Permit

The Statewide stormwater NPDES permit for general industrial activity (Order 2014-0057-DWQ, superseding Order 97-03-DWQ) regulates discharges associated with 10 broad categories of industrial activities, such as operation of wastewater treatment works, and with recycling facilities. The industrial general permit requires the implementation of Best Available Technology Economically Achievable and Best Conventional Pollutant Control Technology to achieve performance standards. The permit also requires development of a SWPPP that identifies the site-specific sources of pollutants and describes the measures at the facility applied to reduce stormwater pollution. A monitoring plan is also required.

Stormwater

In November 1990, the EPA published regulations establishing NPDES permit requirements for municipal and industrial stormwater discharges. Phase I of the permitting program applied to municipal discharges of stormwater in urban areas where the population exceeded 100,000 persons. Phase II of the NPDES stormwater permit regulations, which became effective in March 2003, required that NPDES permits be issued for construction activity for projects disturbing 1–5 acres. Phase II of the municipal permit system (known as the NPDES General Permit for Small MS4s, Order No. 2003-0005-DWQ as amended by 2013-0001-DWQ) required small municipalities of fewer than 100,000 persons to develop stormwater management programs. This permit authorizes discharges of stormwater and some categories of non-stormwater that are not “significant contributors of pollutants.”

Provision C.3 in the Municipal Regional Permit requires site designs for new developments and redevelopments to minimize the area of new roofs and paving, treat runoff, and, in some cases, control the rates and durations of site runoff. Where feasible, pervious surfaces should be used instead of paving so that runoff can infiltrate to the underlying soil. Runoff should be dispersed to landscaping where possible. Remaining runoff from impervious areas must be treated using bioretention or similar controls. In some developments, the rates and durations of site runoff must also be controlled.

The C.3 requirements are separate from, and in addition to, requirements for erosion and sediment control and for pollution prevention measures during construction. In addition, project applicants must execute agreements to allow municipalities to verify that stormwater treatment and flow-control facilities that are approved as part of new development are maintained in perpetuity.

California Toxics Rule and State Implementation Policy

The CTR, presented in 2000 in response to requirements of EPA's NTR, establishes numeric water quality criteria for approximately 130 priority pollutant trace metals and organic compounds. The CTR criteria are regulatory criteria adopted for inland surface waters, enclosed bays, and estuaries in California that are on the CWA Section 303(c) list for contaminants. The CTR includes criteria for the protection of aquatic life and human health. Human health criteria (water- and organism-based) apply to all waters with a municipal and domestic water supply beneficial use designation as indicated in the basin plans. The Policy for Implementation of Toxics Standards for Inland Surface Waters, Enclosed Bays, and Estuaries of California, also known as the State Implementation Policy, was adopted by the State Water Board in 2000. It establishes provisions for translating CTR criteria, NTR criteria, and Basin Plan water quality objectives for toxic pollutants into:

- NPDES permit effluent limits,
- Effluent compliance determinations,
- Monitoring for 2,3,7,8-tcdd (dioxin) and its toxic equivalents,
- Chronic (long-term) toxicity control provisions,
- Site-specific water quality objectives, and
- Effluent compliance exceptions.

The goal of the State Implementation Policy is to establish a standardized approach for permitting discharges of toxic effluent to inland surface waters, enclosed bays, and estuaries throughout the State.

Sustainable Groundwater Management Act

On August 29, 2014, the California Legislature passed comprehensive groundwater legislation contained in Senate Bill (SB) 1168, SB 1319, and Assembly Bill (AB) 1739, which are collectively referred to as the Sustainable Groundwater Management Act (SGMA). This legislation was signed by Governor Brown on September 16, 2014, and it became effective on January 1, 2015. The legislative intent of SGMA is to provide sustainable management of groundwater basins, enhance local management of groundwater, establish minimum standards for sustainable groundwater management, and provide local groundwater agencies with the authority and the technical and financial assistance necessary to sustainably manage groundwater.

The Livermore Valley Groundwater Basin is designated by the State as a medium priority basin and thus requires an approved Groundwater Sustainability Plan (GSP) by January 31, 2022.¹¹ SGMA requires that all basins designated as being in medium priority be managed by one or more Groundwater Sustainability Agency (GSA) and covered by a single GSP or a coordinated set of GSPs. If the statutory deadline is not met for GSP development and/or implementation, the State has the authority to intervene and manage groundwater within non-compliant subbasins. SGMA requires that adopted GSPs result in sustainable groundwater management which avoids undesirable results.

Zone 7 is the exclusive GSA for the Livermore Valley Groundwater Basin and has managed local surface and groundwater resources for beneficial uses and users for more than 50 years. Zone 7 has

¹¹ California Department of Water Resources (DWR). 2022. SGMA Basin Prioritization Dashboard. Accessed May 27, 2022.

compiled a grant application to prepare for the 2022 update to the GSP. Zone 7 also prepares annual reports of the groundwater basin that summarize the basin conditions over the water year (from October to September).¹² The 2021 Annual Report for the Livermore Valley Groundwater Basin concluded that groundwater flow directions and magnitudes did not vary greatly between the seasonal high to seasonal low periods in 2021. Basin-wide groundwater extractions totaled approximately 22,747 acre-feet (AF) during 2021, 98 percent (22,249 AF) of which was used for municipal supplies. Zone 7 extracted 71 percent (16,440 AF, including 181 AF of pumping losses) of the total extraction. In addition to groundwater extraction, Zone 7 imported a total of 27,547 AF of surface water supplies to the Livermore Valley Groundwater Basin in 2021. Total water use within the Livermore Valley Groundwater Basin for 2021 consisted of 39 percent groundwater, 47 percent imported water, and 14 percent recycled water.¹³

California Code of Regulations (Vector Control)

In California, local vector control agencies have the authority to conduct surveillance for vectors, prevent the occurrence of vectors, and abate production of vectors (California Health and Safety Code § 2040). Vector control agencies also have authority to participate in review, comment, and make recommendations regarding local, State, or federal land use planning and environmental quality processes, documents, permits, licenses, and entitlements for projects and their potential effects with respect to vector production (California Health and Safety Code § 2041). Additionally, agencies have broad authority to influence landowners to reduce or “abate” the source of a vector problem. Agencies have authority to “abate” vector sources on private and publicly owned properties (California Health and Safety Code § 2060-2065).

Regional

Alameda Countywide Clean Water Program

The Alameda Countywide Clean Water Program was established reduce the pollution carried by stormwater into local creeks, wetlands, and the San Francisco Bay. The program is a partnership of Alameda County; the cities of Alameda, Albany, Berkeley, Dublin, Emeryville, Fremont, Hayward, Livermore, Newark, Oakland, Piedmont, Pleasanton, San Leandro, and Union City; the Alameda County Flood Control and Water Conservation District, and Zone 7. The CWA and the Porter-Cologne Act require that large urban areas discharging stormwater into the San Francisco Bay have an NPDES permit to prevent harmful pollutants from being dumped or washed by stormwater runoff into the stormwater system and then discharged into local waterbodies. The Municipal Regional Stormwater NPDES Permit (MRP) outlines the State's requirements for municipal agencies in Alameda County to address the water quality and flow-related impacts of stormwater runoff. The NPDES Permit for the San Francisco Bay Area, which includes the City of Pleasanton, is NPDES Permit No. CAS612008; this permit was recently updated by Order No. R2-2022-0018.¹⁴ Some of these requirements are

¹² Alameda County Flood Control and Water Conservation District Zone 7 (Zone 7). 2022. Sustainable Groundwater Management and the SGMA. Website: <https://www.zone7water.com/sustainable-groundwater-management-and-sgma>. Accessed May 27, 2022.

¹³ Alameda County Flood Control and Water Conservation District Zone 7 (Zone 7). 2021. Livermore Valley Groundwater Basin Sustainable Groundwater Management Annual Report Water Year 2021 (October 2022 –September 2021).

¹⁴ California State Water Resources Control Board (State Water Board). 2022. San Francisco Bay Region Municipal Regional Stormwater NPDES Permit: Order No. R2-2022-0018, NPDES Permit No. CAS612008.

implemented directly by municipalities while others are addressed by the Alameda Countywide Clean Water Program on behalf of all the municipalities.¹⁵

Tri-Valley Local Hazard Mitigation Plan

In 2018, the City of Pleasanton, the cities of Livermore and Dublin, the Livermore-Pleasanton Fire Department (LFPD), Dublin San Ramon Services District, and the Lawrence Livermore National Laboratory updated and adopted the Tri-Valley Local Hazard Mitigation Plan (LHMP). The LHMP assesses hazard vulnerabilities and identifies mitigation actions that jurisdictions will pursue in order to reduce the level of injury, property damage, and community disruption that might otherwise result from such events. The Tri-Valley LHMP administers a uniform hazard mitigation strategy for the Tri-Valley area and addresses several hazards including, but not limited to, wildland fire, floods, and earthquakes. The Tri-Valley LHMP includes 7 Pleasanton specific mitigation actions related to dam failure and flood.¹⁶ The City and other participating agencies are in the process of completing the 5-year update to the LHMP, with adoption scheduled in 2023.

Alameda County Vector Control Services District

Alameda County Vector Control Services District is a Division of the Alameda County Environmental Health Department, part of the Alameda County Health Care Services Agency. Their mission is to prevent the spread of vector-borne diseases, injury, and discomfort to the residents of the District by controlling insects, rodents, and other vectors. They provide programs and services to increase the knowledge related to the organisms that are vectors, such as ants, bats, and bed bugs. They also provide information related to wildlife, environmental health, and solid waste and garbage to assist society in overcoming vector-borne diseases.¹⁷

Alameda County Mosquito Abatement District

The Alameda County Mosquito Abatement District works to improve the health and comfort of Alameda County residents by controlling mosquitoes and limiting the transmission of mosquito-borne illnesses. Their programs include integrated pest management; surveillance; community education; physical; biological, and chemical control; technology and innovation, and mitigated health risks associated with mosquito spawning in swimming pools.¹⁸

Local

City of Pleasanton General Plan

The General Plan, adopted in 2009 and last amended in August 2019, contains the following relevant policies and actions that assist in reducing or avoiding impacts related to hydrology and water quality:

¹⁵ Alameda County Clean Water Program. 2022. About the Clean Water Program. Website: <https://www.cleanwaterprogram.org/about-us.html>. Accessed June 2, 2022.

¹⁶ Tetrattech. 2018. Tri-Valley Local Hazard Mitigation Plan: Volume 2-Planning Partner Annexes.

¹⁷ Alameda County Vector Control. No date. Alameda County Vector Control Services: About Us. Website: <https://acvcsd.org/about-us/>. Accessed August 25, 2022.

¹⁸ Alameda County Mosquito Abatement District. 2022. About Us. Website: <https://www.mosquitoes.org/about-us>. Accessed August 25, 2022.

Water Element

The Water Element, Chapter 8 of the General Plan, consolidates information and policies related to the conservation and management of water resources, riparian corridors, and watershed lands and defines the water and wastewater capacity and stormwater facilities needed to serve the community at General Plan buildout.

Goal 1 Preserve and protect water resources and supply for long-term sustainability.

Policy 1 To ensure sustainability, promote the conservation of water resources.

Program 1.1 Prohibit water supply production policies and practices which would deplete groundwater resources below existing sustainable levels.

Program 1.2 Foster water conservation practices which do not allow depletion of groundwater and surface water resources to the extent that they cannot be replaced within the same water season.

Program 1.4 Work with Zone 7 Water Agency to investigate innovative and more efficient ways to recharge aquifers and other groundwater resources.

Program 1.5 Utilize cost-effective water reclamation and recycling techniques for the purpose of water conservation rather than as a new source of water which must be used to sustain new and existing development, where these techniques can be implemented without degrading surface water and groundwater quality.

Program 1.6 Investigate the feasibility of using stormwater runoff, if all water quality measures are in place, for irrigation and groundwater recharge.

Program 1.7 Require the installation of water conservation devices in new construction and additions.

Program 1.13 Plant drought-tolerant landscaping in appropriate locations. All landscaping aspects from plant selection to irrigation methods should be designed to reduce water demand, decrease runoff, and minimize impervious surfaces.

Water Resources

Goal 2 Provide healthy water courses, riparian functions, and wetlands for humans, wildlife, and plants.

Policy 2 Preserve and enhance streambeds and channels in a natural state

Program 2.2 Develop policies and standards in cooperation with Zone 7 that include restoring riparian corridors when flood- and erosion-control activities require channelization.

Program 2.3 Utilize habitat preservation and reclamation measures when designing flood- and erosion-control projects to limit impacts on plants and wildlife.

Program 2.4 Design projects adjacent to the arroyos to protect habitat areas.

Water Quality

Goal 3 Ensure a high level of water quality and quantity at a reasonable cost and improve water quality through production and conservation practices which do not negatively impact the environment.

Policy 3 Protect the quality and quantity of surface water and groundwater resources in the Planning Area.

Program 3.1 Do not utilize water reclamation techniques, including reverse osmosis, which could adversely affect or have potentially negative impacts on drinking water quality, surface waters, or groundwater resources.

Program 3.4 To preserve areas with prime percolation capabilities, regulate projects that use toxic chemicals including herbicides in water recharge areas, such as adjacent to arroyos.

Program 3.6 Prohibit new septic systems, automobile dismantlers, waste disposal facilities, industries utilizing toxic chemicals, and other potentially polluting uses in areas where pollution could impact flood waters, groundwater, streams, creeks, or reservoirs.

Program 3.8 Coordinate with the Dublin San Ramon Services District to investigate cost-effective sewage treatment and disposal methods that utilize reclaimed wastewater for productive use and that protect the quality of the groundwater supply.

Program 3.11 Support Zone 7 in implementing its Stream Management Master Plan so as to protect and enhance the water quality of streams and groundwater.

Water Systems

Goal 4 Provide sufficient water supply and promote water safety and security.

Policy 4 Ensure an adequate water system and a high-quality water supply for existing and future development and maintain an adequate reserve of water in storage facilities.

Program 4.1 Require new development to pay for its fair share of the City's water system master plan improvements.

Program 4.2 Develop a contingency plan for potential water shortages including groundwater management and water conservation.

Program 4.9 In anticipate of planned future growth in Pleasanton, continue working with Zone7 to plan and provide for sufficient future water supplies.

Program 4.10 Continue to work with Zone 7 to ensure that use of the groundwater basin by Zone 7 does not result in deterioration of water quality

Wastewater

Goal 5 Provide adequate sewage treatment and minimize wastewater export.

Policy 5 Secure sewage capacity through all available means for residential, commercial, and industrial development.

Program 5.1 Require new development to pay its fair share of the City's planned sewer system improvements including treatment, distribution, reuse, and export facilities.

Policy 6 Approve only those sewage collection, treatment, and export expansion alternatives which are cost- and energy-efficient and do not create a health hazard.

Program 6.1 Utilize wastewater reuse/reclamation methods to the fullest extent financially and environmentally feasible. Identify additional parks, playgrounds, and nonresidential landscaping where recycled tertiary treated wastewater could be used without negatively impacting groundwater (e.g., with salt buildup). Encourage new parks and non-residential landscaped areas to use recycled wastewater whenever feasible, safe, cost-effective, and nonpolluting. Encourage new and retrofitted commercial uses to utilize recycled wastewater for landscaping and toilets, whenever feasible, safe and nonpolluting.

Policy 7 Support cost-effective and environmental sensitive approaches to wastewater reuse in the Tri-Valley

- Work with Zone 7 and other water, wastewater, business, and planning agencies to support cost-effective and environmentally sensitive approaches to Tri-Valley wastewater reuse.

Stormwater Facilities

Goal 6 Minimize stormwater runoff and provide adequate stormwater facilities to protect property from flooding.

Policy 8 Ensure an adequate storm drainage system to serve existing and future development.

Program 8.1 Require new development to pay its fair share of the storm drainage system improvement costs.

Program 8.4 As determined by the City Engineer, require new development to improve local storm drainage systems to accept appropriate design-year flows resulting from new development.

Policy 9 Ensure a sufficient flood control system to serve existing and future development.

- Program 9.1** Require new development to pay its fair share of the flood control improvement costs included in Zone 7's Master Plan.
- Goal 7** Reduce stormwater runoff and maximize infiltration of naturally-occurring rainwater so as to improve surface and subsurface water quality.
- Policy 10** Encourage a built environment that minimizes impervious surfaces.
- Program 10.1** Review development plans to minimize impervious surfaces and generally maximize infiltration of rainwater in soils, where appropriate. Maximize permeable areas to allow more percolation of runoff into the ground through such means as biofilters, green strips, planter strips, decomposed granite, porous pavers, swales, and other water-permeable surfaces. Require planter strips between the street and the sidewalk within the community, wherever practical and feasible.
- Program 10.2** Maximize the runoff directed to permeable areas or to stormwater storage by (1) orienting roof runoff toward permeable surfaces or drains, (2) grading the site to divert flow to permeable areas, (3) using cisterns, retention structures, or green rooftops to store precipitation for reuse, and (4) designing curbs and berms so as to avoid isolating permeable or landscaped areas.
- Program 10.4** Consider reducing parking ratios for transit-oriented and mixed-use development.
- Program 10.5** Discourage additional parking over and above required minimum parking standards for any land use, unless the developer can demonstrate a need for additional parking.
- Program 10.6** Encourage multi-story parking garages when practical to limit the land area covered by parking.
- Program 10.7** Create a vegetative buffer between streambeds and development. Developers should retain existing vegetation and, where necessary, plant these buffers with native plant species.
- Policy 11** Implement stormwater runoff requirements, as required by the State Regional Water Quality Control Board and the Alameda Countywide Clean Water Program, with as little impact on development and business costs as possible.
- Program 11.1** Incorporate conditions of approval developed by the Alameda Countywide Clean Water Program, as appropriate, for new development and discretionary permits.
- Program 11.2** Develop design guidelines and standard details to enable developers to incorporate clean water runoff requirements into their projects.
- Program 11.3** Using the California Environmental Quality Act (CEQA) process, evaluate the development effects on stormwater runoff.

- Program 11.4** Encourage site planning and design techniques to minimize water quality impacts, including minimizing land disturbance, minimizing impervious surfaces, clustering development, preserving open space, and maintaining riparian areas with buffer zones to reduce runoff into waterways.
- Program 11.5** Include stormwater quality requirements in plans and contract specifications for City projects.
- Program 11.6** Require use of Best Management Practices for construction activities and ongoing business operations to prevent contaminants from entering the storm drain system.
- Program 11.8** To effectively prohibit non-stormwater discharges, conduct construction site field inspections to ensure proper erosion prevention and materials/waste management implementation

Public Safety Element

Geologic Hazards

- Goal 2** Minimize the risks to lives and property, and minimize potential liability to the City, due to geologic hazards within the Planning Area.
- Policy 6** Restrict new development of sites with structures intended for human occupancy in any landslide-prone or unstable area.
- Program 6.2** Requires developers to include drainage, erosion, and landslide mitigation measures to reduce landslide potential.
- Program 6.3** Design irrigation systems to minimize the potential for soil saturation, excessive runoff, and other factors deemed to contribute to slope instability.

Flood Hazards

- Goal 4** Minimize the risks to lives and property due to flood hazards.
- Policy 14** Inform the public of the Del Valle Dam evacuation system.
- Program 14.1** Conduct public meetings and issue press releases regarding public evacuation procedures, as outlined in the City's Comprehensive Emergency Management Plan.
- Policy 15** Prohibit all development within the 100-year flood zone unless mitigation measures that meet Federal Insurance Administration criteria are provided
- Program 15.1** Abide by the regulations of the National Flood Insurance Program, and continuously update related City ordinances.

Housing Element

The Housing Element is the primary tool used by the State to ensure local governments are appropriately planning for and accommodating enough housing across all income levels for the

planning period 2023-2031. The Housing Element is a mandatory part of a jurisdiction's General Plan, but it differs from other General Plan elements in two key aspects: (1) it must be updated every eight years for jurisdictions within a Metropolitan Planning Organization (MPO), such as the Association of Bay Area Governments (ABAG); and (2) it must also be reviewed and approved by the California Department of Housing and Community Development (HCD) to ensure compliance with statutory requirements. Goals, policies, and programs regarding hydrology and water quality in the Housing Element are provided in Chapter 2, Project Description, specifically, Goals 4 and 6, Policies 4.2, 6.1, and 6.3, and Program 4.4 provide guidance for hydrology and water quality.

Vineyard Avenue Corridor Specific Plan

The Vineyard Avenue Corridor Specific Plan includes the 384-acre area along Vineyard Avenue in southeast Pleasanton. The Vineyard Avenue Corridor Specific Plan establishes a unique environment which includes a variety of agricultural, residential, open space, recreational, educational, and other uses. Objectives, policies, and guidelines regarding hydrology and water quality in the Vineyard Avenue Corridor Specific Plan include:

Public Facilities Objectives

1. To facilitate the provision of water, sanitary sewer, stormwater drainage, and other utility systems within a well-integrated overall network
2. To facilitate flexibility in timing and planning in infrastructure improvements
3. To provide the opportunity for improved water and sanitary sewer service for existing residents within the Plan Area

Water Conservation Measures

- New development shall install water conservation devices and utilize drought-tolerant landscaping to the extent feasible.

Water Quality and Protection Requirements Relating to Construction

- Projects disturbing more than 5 acres¹⁹ of land during construction shall be required to file an NOI to be covered under the State NPDES General Construction Permit, for discharges of stormwater associated with construction activity. The developer shall propose control measures that are consistent with the State General Permit.
- A Storm Water Pollution Prevention Plan (SWPPP) shall be developed and implemented for each site covered by the general permit. A SWPPP shall include Best Management Practices designed to reduce potential impacts to surface water quality through the construction and life of the project. A SWPPP shall be prepared such that, when properly implemented, will reduce or eliminate impacts to surface water quality from all phases of the project. Required elements of the SWPPP include the following:
 - Construction stormwater management controls shall be implemented which include practices to minimize the contact of construction material, equipment, and maintenance

¹⁹ This language is taken directly from the Vineyard Avenue Corridor Specific Plan, and the standard has been updated since adoption of this Plan. The State Water Board stormwater general permit for construction activity (Order 2009-009-DWQ, as amended by Order Nos. 2010-0014-DWQ and 2012-0006-DWQ) applies to all construction activities that would disturb 1 acre of land or more.

- supplies (e.g., fuels, lubricants, paints, solvents, adhesives) with stormwater. The SWPPP shall specify properly designed centralized storage areas that keep these materials out of the rain. It shall also include a monitoring program by the construction site supervisor.
- Best Management Practices shall be implemented to reduce erosion of exposed soil and may include, but not be limited to, soil stabilization controls, watering for dust control, perimeter silt fencing, placement of hay bales, and sediment basins. The potential for erosion is generally increased if grading is performed during the rainy season as disturbed soil can be exposed to rainfall and storm runoff. If grading must be conducted during the rainy season, the primary BMPs selected shall focus on erosion control to keep sediment on the slopes. End-of-pipe sediment control measures (e.g., basins and traps) shall be used only as secondary measures. If hydroseeding is selected as the primary soils stabilization method, then slopes shall be seeded by September 1 to October 1. Entry and egress from the construction site shall be carefully controlled to minimize off-site tracking of sediment. Vehicle and equipment wash-down facilities shall be designed to be accessible and functional both during dry and wet conditions.
 - Appropriate measures shall be taken to prevent stormwater pollution associated with post-construction activities at developed sites. Because the Plan Area includes relatively low-density development, it may be practical for the design of the residential development areas to include “no net gain” in stormwater runoff from the site. Large single-family home lots generally provide many opportunities for stormwater management, including unit pavers on sand patios, concave lawn/infiltration basins, and dry wells connected to roof downspouts.

Hacienda PUD Development Plan Design Guidelines

The Hacienda Planned Unit Development (PUD) area is generally located south of Interstate 580 (I-580), west of Tassajara Creek, north of W. Las Positas Boulevard, and east of Hopyard Road. The Hacienda PUD Development Plan Design Guidelines (Hacienda Design Guidelines) ensure that development within the Hacienda PUD area is within the best interests of the public’s health, safety, and general welfare, is consistent with the General Plan, compatible with existing developed properties, presents a positive image for the city along the I-580 frontage, and development within the Hacienda PUD area conform to the purpose of the PUD. Parcel 5D corresponds to Site 5 (Laborer Council), Parcel 9 corresponds to Site 7 (Hacienda Terrace), Parcel 18B to Site 8 (Muslim Community Center), Parcel 58C to Site 9 (Metro 580), and Parcel 56C corresponds to Site 29 (Oracle). Section 2.8(B) includes requirements for storm drainage collection and requires that all development within the Hacienda PUD area provide on-site storm drainage collection compliant with Low Impact Development standards.

Pleasanton Municipal Code

Chapter 9.14 Stormwater Management and Discharge Control

Chapter 9.14 of the Municipal Code ensures that the future health, safety, and general welfare of city citizens by eliminating the non-stormwater discharges to the municipal separate storm sewer, controlling the discharge to municipal separate storm sewers from spills, dumping or disposal of materials other than stormwater, and reducing pollutants in stormwater discharges to the maximum extent practicable, consistent with the CWA.

Chapter 9.30 Water Conservation Plan

Chapter 9.30 of the Municipal Code provides both voluntary and mandatory water conservation stages to minimize the effect of a shortage of water on the city's customers and, by means of this chapter, to adopt provisions that will significantly reduce the consumption of water over an extended period of time, thereby extending the available water required for the city's customers while reducing the hardship to the greatest extent possible on or to the City and on or to the general public. This chapter is also intended to implement the Urban Water Management Plan (UWMP) water shortage contingency planning and stages of action.

Chapter 15.16 Connections to Sewerage Systems

Chapter 15.16 of the Municipal Code mandates that all premises generating sewage shall be connected to the sewerage system with the exception of those approved for private disposal.

Chapter 15.24 Sewer Service Regulations

Chapter 15.24 of the Municipal Code discusses the application process to discharge sewage into the sewerage system that shall be made to the City on an application form as prescribed by the director and containing such information as may be required to determine the capacity required and the need for any wastewater discharge permit or other special permit. No discharge to the sewerage system shall be allowed until a connection permit has been issued authorizing a permitted amount of sewage flow in accordance with the capacity allocated in the connection permit.

Chapter 15.28 Sewer Use Regulations

Chapter 15.28 of the Municipal Code mandates that no person shall discharge, deposit, or throw, or cause, allow, or permit to be discharged, into any public sewer or plumbing fixture or to any drain, manhole, culvert, catchbasin, sanitary catchbasin, or private sewer which connects to the sewerage system, any substance of any kind whatsoever tending to obstruct or injure the sewerage system, or cause a nuisance, or which shall in any manner interfere with the proper repair or maintenance of the sewerage system, or which shall in any way render it difficult for any workmen [*sic*] to operate or repair the sewerage system, or render it impossible to meet the effluent or solid residues disposal requirements which may be set by the RWQCB.

Chapter 15.36 Wastewater Discharge Permits

Chapter 15.36 of the Municipal Code discusses that a wastewater discharge permit may be issued by the director to any user, upon application therefor, who: (1) requests that charges and fees established pursuant to this chapter be based upon an estimated volume of wastewater discharged, or to be discharged, into the sewerage system, or (2) establishes to the satisfaction of the director that wastewater proposed to be discharged from the user's premises into the sewerage system has, or will have, due to pretreatment, process changes, or other reasons related to such wastewater characteristics, wastewater strength characteristics less than the normal range for the user classification to which such user is assigned.

Chapter 17.08 Flood Damage Protection

Chapter 17.08 of the Municipal Code provides methods and provisions to reduce flood losses, including restricting or prohibiting uses which are dangerous to health, safety, and property due to

water or erosion hazards, or which result in damaging increases in erosion or in flood heights or velocities; requiring that uses vulnerable to floods, including facilities which serve such uses, be protected against flood damage at the time of initial construction; controlling the alteration of natural floodplains, stream channels, and natural protective barriers, which help accommodate or channel floodwaters; controlling filling, grading, dredging, and other development which may increase flood damage; and preventing or regulating the construction of flood barriers which will unnaturally divert floodwaters or which may increase flood hazards in other areas.

3.9.4 - Impacts and Mitigation Measures

Significance Criteria

The City is utilizing State CEQA Guidelines Appendix G as thresholds of significance for the Housing Element Update. To determine whether impacts related to hydrology and water quality are significant environmental effects, the following questions are analyzed and evaluated. Would the Housing Element Update:

- a) Violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or groundwater quality?
- b) Substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the Housing Element Update may impede sustainable groundwater management of the basin?
- c) Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river or through the addition of impervious surfaces, in a manner which would:
 - (i) Result in substantial erosion or siltation on- or off-site;
 - (ii) Substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off-site;
 - (iii) Create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff;
or
 - (iv) Impede or redirect flood flows?
- d) In flood hazard, tsunami, or seiche zones, risk release of pollutants due to project inundation?
- e) Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan?

Approach to Analysis

Impacts related to hydrology and water quality were determined by reviewing information regarding regional and local hydrology, climate, topography, and geology contained in the General Plan and General Plan EIR, San Francisco Bay RWQCB Basin Plan, and FEMA FIRMs. The impact analysis is based on an assessment of baseline conditions for the potential sites for rezoning, including climate, topography, watersheds and surface waters, groundwater, and floodplains. This analysis identifies

potential impacts to hydrology and water quality from construction, operation, and maintenance activities related to future development consistent with the Housing Element Update.

Hydrology and water quality impacts associated with the development on the Dublin-Pleasanton Bay Area Rapid Transit (BART) station property were evaluated at a programmatic level in the 2015-2023 (5th Cycle) Housing Element Supplemental Environmental Impact Report and State Clearinghouse (SCH) No. 2011052002; no additional impacts with respect to hydrology and water quality are associated with the Housing Element Update. Therefore, this analysis does not include the Dublin-Pleasanton BART station property site.

Impact Evaluation

Surface and Groundwater Quality

Impact HYD-1: Development consistent with Housing Element Update, rezonings, and General and Specific Plan Amendments would not violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or groundwater quality.

The Housing Element Update is a policy document and does not entitle any specific development. However, future development consistent with the Housing Element Update would result in additional residential and nonresidential development in the city. Because much of the city is fully built out, development consistent with the Housing Element Update would largely occur on infill development sites. Additionally, development of these sites may result in other private and public improvements throughout the city with the potential for environmental effects related to hydrology and water quality.

Construction

Future development consistent with the Housing Element Update would involve grading, excavation, and removal of vegetative cover that has the potential to result in runoff that contains sediment and other pollutants that could degrade surface and groundwater quality if not properly controlled. Sources of potential pollution associated with construction include fuel, grease, oil and other fluids, concrete material, sediment, and litter. These pollutants have the potential to result in impacts due to chemical contamination from construction activities and materials that could pose a hazard to the environment or degrade water quality if not properly managed and controlled.

Any future development consistent with the Housing Element Update (including redevelopment of existing developed sites) that disturbs 1 acre or more of soil or that is part of a common plan of development that disturbs 1 acre or more of soil must obtain permit coverage under the Construction General Permit by filing an NOI and SWPPP with the RWQCB prior to commencement of construction. The SWPPP must describe the site, the facility, erosion and sediment controls, runoff water quality monitoring, means of waste disposal, implementation of approved local plans, control of construction sediment and erosion-control measures, maintenance responsibilities, and non-stormwater management controls. Inspection of construction sites before and after storms is also required to identify stormwater discharge from the construction activity and to identify and implement erosion controls where necessary. Because these provisions are more stringent than those included in the Vineyard Avenue Corridor Specific Plan, they would ensure that development

on Site 27 (PUSD-Vineyard) would be consistent with the “Water Quality and Protection Requirements Relating to Construction” included in the Vineyard Avenue Corridor Specific Plan.

Future development consistent with the Housing Element Update would also be required to comply with the California Green Building Standards Code (CALGreen) which requires the incorporation of BMPs for materials and waste storage, handling, equipment and vehicle maintenance, and fueling to reduce potential discharge of polluted runoff from construction sites. The General Plan includes policies and programs that protect water quality during construction. Water Element Program 11.4 encourages site planning and design techniques to minimize water quality impacts, including minimizing land disturbance, minimizing impervious surfaces, clustering development, preserving open space, and maintaining riparian areas with buffer zones to reduce runoff into waterways. Additionally, Program 11.6 requires the use of BMPs during construction activities and ongoing business operations to prevent contaminants from entering the storm drain system. Program 8.4 of the Water Element requires new development to improve local storm drainage systems and to accept appropriate design-year flows resulting from new development, as determined by the City Engineer.

The Municipal Code also contains rules and regulations to protect water quality during construction. Section 9.14.080 (Reduction of pollutants in stormwater) identifies construction-related BMPs to reduce pollutants entering the City storm sewer system. Section 15.36.040 (Permit conditions) discusses the conditions in which a wastewater discharge permit is required.

All future development consistent with the Housing Element Update disturbing more than 1 acre of soil would be required to comply with the NPDES permit and implement a construction SWPPP, which requires future development consistent with the Housing Element Update to incorporate BMPs to control sedimentation, erosion, and hazardous materials contamination of runoff during construction. The NPDES permit requires that there be no net increase in stormwater rates and runoff at a development site after completion of project construction through preparation of a hydromodification and stormwater management plan. Common methods to control stormwater runoff rates and protect water quality, among many, include drainage lines that can rapidly percolate water (such as rock lined ditches or vegetated swales), minimizing impervious surfaces (using pervious pavement and drought tolerant landscaping), and proper waste management practices. Developers of new projects would be required to install adequately sized storm drains to connect to the City’s existing underground storm drain network.

Site plans, design, and BMPs for residential and nonresidential projects consistent with the Housing Element Update, including those that disturb less than 1 acre of soil, would be required to demonstrate proper compliance with applicable water quality regulations as project proponents apply for development permits and applicable NPDES permits. Compliance would be ensured by the City and/or the San Francisco Bay RWQCB through their review and approval of applicable permits and would ensure that new development would not substantially worsen existing water quality problems. This process would include incorporation of BMPs at the direction of the San Francisco Bay RWQCB to control construction-related erosion and sedimentation.

Consistent with Water Element Program 8.4, development proposals, including grading and drainage plans, would be reviewed by the City's Engineering Department for compliance with City ordinance codes regarding water quality standards. As discussed above, as specific development projects are proposed, those projects would be required to implement construction and design-level measures to minimize potential impacts related to water quality and quantity changes. Further, Water Element Program 11.3 requires the use of the CEQA process to evaluate the development effects on stormwater runoff and ensure any potentially significant impacts are mitigated as appropriate.

Compliance with mandatory NPDES permit requirements, adherence to the Municipal Code, and implementation of General Plan policies and actions would ensure that impacts related to water quality degradation from construction activities would be less than significant.

Operation

All future development consistent with the Housing Element Update could add additional areas of impervious surfaces within the city and could therefore increase the volume of pollutants that are typically associated with urban runoff into the stormwater. These pollutants can include sediments, petroleum hydrocarbons, pesticides, fertilizers, and heavy metals such as lead, zinc, and copper that tend to build up during the dry months of the year. Precipitation during the early portion of the wet season (generally from November to April) washes away most of these pollutants, resulting in high pollutant concentrations in the initial wet weather runoff. This initial runoff is referred to as the "first flush" of storm events. Subsequent periods of rain would result in less concentrated pollutant levels in the runoff.

The amount and type of runoff generated by the various future projects consistent with the Housing Element Update could potentially be greater than under existing conditions. An increase in impervious surfaces could result in a corresponding increase in urban runoff pollutants and first flush hardscape contaminants, as well as an increase in nutrients and other chemicals from landscaped areas. These constituents could result in water quality impacts to on-site and off-site drainage flows to area waterways.

Compliance with NPDES and MS4 permits for future residential development, as well as successful implementation of a site-specific SWPPP features, would reduce the potential for pollution from incidental spills of vehicle oils and other chemicals that can be conveyed by storm and landscape irrigation flows during operation. Additionally, CALGreen requires source controls for outdoor material storage areas, outdoor trash storage/waste handling areas, outdoor loading/unloading dock areas, and building materials areas to improve water quality. Source controls would also include storm drain messages and signage and beneficial landscape irrigation practices.

The General Plan includes policies and actions intended to protect water quality in and around the city. Water Element Program 3.4 regulates projects that use toxic chemicals, including herbicides, in water recharge areas, such as adjacent to arroyos, to preserve areas with prime percolation capabilities. Program 10.2 requires projects to maximize the runoff directed to permeable areas or to stormwater storage by orienting roof runoff toward permeable surfaces or drains; grading the site to divert flow to permeable areas; using cisterns, retention structures, or green rooftops to store precipitation for reuse; and designing curbs and berms to avoid isolating permeable or landscaped

areas. Additionally, the Public Safety Element contains Program 6.2 and 6.3, which require new development to include irrigation systems to minimize the potential for soil saturation, excessive runoff, and other factors deemed to contribute to slope instability.

The Municipal Code contains rules and regulations to protect water quality during operation. Section 9.14.080 (Reduction of pollutants in stormwater) also identifies operational BMPs to reduce pollutants entering the storm sewer system.

As discussed above in the regulatory framework section, groundwater supply Wells 5, 6, and 8 showed detection of contaminants above the Response Level for PFAS and the groundwater supply wells for the city may be taken out of commission no later than the first quarter of 2023. This is an existing condition and, because residential uses are not uses associated with the production of PFAS, development consistent with the Housing Element Update would not exacerbate this existing condition and would not result in the further degradation of groundwater quality.

Future development consistent with the Housing Element Update would be required to comply with regulations enforced by the RWQCB. In addition to existing State regulations, future projects would also comply with requirements of the Municipal Code and policies and actions included in the General Plan related to water quality. Therefore, during operation, future development consistent with the Housing Element Update would not violate any water quality standards or WDR or otherwise substantially degrade surface or groundwater quality. Further, consistent with General Plan, Water Element Program 11.3, all future development would be further assessed on a project-by-project basis compliant with CEQA to evaluate effects on stormwater runoff, and this analysis would ensure any potentially significant impacts are mitigated as appropriate. As such, the Housing Element Update would result in a less than significant impact relative to water quality.

Level of Significance

Less than significant impact.

Groundwater Supply/Recharge

Impact HYD-2: Development consistent with the Housing Element Update, rezonings, and General and Specific Plan Amendments would not substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin.

As discussed in Impact HYD-1, future development consistent with the Housing Element Update could increase the area of impervious surfaces, which could potentially reduce groundwater infiltration. The addition of new housing would also result in an increase in residential connections to the municipal water supply, which could potentially increase demand on groundwater supplies. Zone 7 is responsible for supplying water as a wholesaler to Pleasanton. Zone 7 provides water to the region by storing water from the South Bay Aqueduct and from local runoff in the Del Valle Reservoir, which it used to replenish groundwater supplies through release into the Arroyo del Valle and the Arroyo Mocho. The sources of water include the South Bay Aqueduct, surface runoff from the Del Valle Reservoir, and local groundwater.

As discussed above in the regulatory framework section, groundwater supply Wells 5, 6, and 8 showed detection of contaminants above the Response Level for PFAS and the groundwater supply wells for the city and may be taken out of commission no later than the first quarter of 2023. This is an existing condition and would not be exacerbated by development consistent with the Housing Element Update because residential uses are not uses associated with the production of PFAS. Therefore, development consistent with the Housing Element Update would not result in the further degradation of groundwater quality. However, the reduction in available groundwater would impact water supply availability, as discussed in more detail in Section 3.15, Utilities and Service Systems. The General Plan includes policies and actions to maximize infiltration and rainwater retention and minimize impacts to groundwater recharge. Water Element Program 1.4, Program 3.11, and Program 4.10 encourage collaboration with Zone 7 to recharge aquifers and protect groundwater quality resources. Program 1.5 directs development to utilize water reclamation and recycling techniques to conserve water while protecting groundwater quality. However, Program 3.1 prevents the use of water reclamation techniques that negatively impact groundwater resources. Program 1.6 and Program 3.8 require development to evaluate the use of stormwater runoff or treated wastewater for groundwater recharge. Further, Program 3.6 prohibits the use septic systems and other waste disposal facilities that could pollute groundwater. Program 6.1 promotes the use of nonresidential landscaping where recycled tertiary treated wastewater could be used without negatively impacting groundwater. Proposed Housing Element Program 4.4 requires the City to assess and plan for adequate water supply, including completion of groundwater treatment improvements to address known contaminants in City-operated wells.

Additionally, the Municipal Code contains rules and regulations to maximize infiltration and rainwater retention and minimize impacts to groundwater recharge. Section 9.30.060 (Stages for reduction in water use) provides both voluntary and mandatory water conservation stages to minimize the effect of a shortage of water on the City's customers and significantly reduce the consumption of water over an extended period of time, which directly impacts groundwater supplies.

Future development consistent with the Housing Element Update would be required to comply with requirements of the Municipal Code and General Plan policies and actions related to maximizing infiltration and rainwater retention and requiring the identification of an adequate water supply. Therefore, future development consistent with the Housing Element Update would not substantially interfere with groundwater recharge or impede groundwater management of the basin, and impacts would be less than significant.

Level of Significance

Less than significant impact.

Drainage Leading to Erosion/Siltation, Flooding, Additional Sources of Polluted Runoff, or Impedance of Flood Flows

- Impact HYD-3:** Development consistent with the Housing Element Update, rezonings, and General and Specific Plan Amendments would not substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river or through the addition of impervious surfaces, in a manner which would:
- i) Result in substantial erosion or siltation on- or off-site;
 - (ii) Substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off-site;
 - (iii) Create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff; or
 - (iv) Impede or redirect flood flows?
-

i) Erosion and Siltation

Future development consistent with the Housing Element Update would involve construction activities such as stockpiling, grading, excavation, paving, and other earth-disturbing activities. Loose and disturbed soils are more prone to erosion and loss of topsoil by wind and water. This could result in an increase in stormwater runoff and the potential to cause erosion or sedimentation in drainage swales and creeks.

As previously discussed, construction activities at the site that would disturb one or more acres of land surface are subject to the Construction General Permit adopted by the State Water Board. Compliance with the permit requires each qualifying development project to file an NOI with the State Water Board. Permit conditions require development of a SWPPP, which must describe the site, the facility, erosion and sediment controls, runoff water quality monitoring, means of waste disposal, implementation of approved local plans, control of construction sediment and erosion-control measures, maintenance responsibilities, and non-stormwater management controls. Inspection of construction sites before and after storms is also required to identify stormwater discharge from the construction activity and to identify and implement erosion controls, where necessary. Because these provisions are more stringent than those included in the Vineyard Avenue Corridor Specific Plan, they would ensure that development on Site 27 (PUSD-Vineyard) would be consistent with the “Water Quality and Protection Requirements Relating to Construction” included in the Vineyard Avenue Corridor Specific Plan.

Additionally, the General Plan includes policies and actions that promote the prevention of erosion and siltation. Water Element Program 2.2 requires compliance with Zone 7 policies regarding the restoration of riparian corridors when flood- and erosion-control activities require channelization. Program 2.3 directs the utilization of habitat preservation and reclamation measures when designing flood- and erosion-control projects to limit impacts on plants and wildlife. Further, Program 11.8 requires construction site field inspections to ensure proper erosion prevention and materials/waste management implementation to effectively prohibit non-stormwater discharges. With compliance

with the NPDES and SWPPP requirements and the policies and actions included in the General Plan, impacts related to erosion and siltation would be less than significant.

ii) Surface Runoff

Future development consistent with the Housing Element Update encourages infill development. New development or redevelopment could increase the total impervious area within the city and increase stormwater runoff, which could result in flooding.

As previously discussed, implementation of applicable General Plan policies would maximize the on-site infiltration capacity for future development consistent with the Housing Element Update and would minimize the off-site runoff that would leave those sites. For example, Water Element Program 1.13 encourages the planting of drought-tolerant landscaping to help decrease runoff and minimize impervious surfaces; Program 6.1 encourages new development to utilize reclamation methods to fullest extent financially and environmentally feasible; Program 10.1 requires the City to review development plans to minimize impervious surfaces and generally minimize infiltration of rainwater in soils; and finally, Program 9.1 requires new development to pay its fair share of the flood control improvement costs included in Zone 7's Master Plan. The General Plan also includes Water Element Policy 11, which requires implementation of stormwater runoff requirements, as required by the State RWQCB and the Alameda Countywide Clean Water Program, with as little impact on development and business costs as possible. In support of this policy, the General Plan includes Programs 11.1, 11.2, 11.3, 11.4, 11.5, 11.6, and 11.8, all of which encourage new development to incorporate conditions of approval developed by the Alameda Countywide Clean Water Program, adhere to design guidelines that comply with clean water runoff requirements, incorporate site planning and design techniques that reduce runoff into waterways, and use BMPs for construction activities to reduce unintended runoff.

Additionally, the Municipal Code contains rules and regulations to maximize on-site infiltration capacity. Section 17.08 (Flood Damage Protection) provides requirements to reduce flood losses due to water or erosion hazards, including the provision of facilities which serve such uses. Compliance with existing regulations, the policies and actions included in the General Plan, and adherence to the Municipal Code would maximize infiltration and rainwater retention, which would in turn reduce stormwater runoff. Additionally, all future development consistent with the Housing Element Update would be evaluated on a project-by-project basis to ensure that there are no significant impacts related to surface runoff and flooding. Further, new development would be required to pay its fair share of the flood control improvement costs. Therefore, impacts related to surface water and flooding would be less than significant.

iii) Exceedance of Storm Drain Capacity

The Housing Element Update encourages development on infill sites and discourages development on hillsides. With the exception of Sites 1 (Lester) and 22 (Merritt), which are located adjacent to hillsides, none of the sites are located near a hillside. New development consistent with the Housing Element Update could increase the total impervious area and increase stormwater runoff, which could exceed stormwater drainage facility capacity or create additional sources of polluted runoff.

However, as described previously, implementation of General Plan policies and programs and adherence to the requirements of the Municipal Code would maximize the on-site infiltration capacity for new development consistent with the Housing Element Update and would minimize off-site water runoff. In addition to the General Plan policies and actions discussed above related to runoff and infiltration, all future development consistent with the Housing Element Update would be required to comply with the General Plan policies and programs related to stormwater capacity, specifically Water Element Policy 8, which ensures adequate storm drainage system to serve existing and future development. Program 8.1 requires new development to pay its fair share of the storm drainage system improvement costs, and Program 8.4 requires new development to improve local storm drainage systems to accept appropriate design-year flows resulting from new development, as determined by the City Engineer. Policy 4.2 of the Housing Element directs the City to ensure that adequate infrastructure is available to support future planned residential growth and Program 4.4 requires the City to develop and updates plans as necessary to address infrastructure deficiencies, including funding mechanisms; the City would make infrastructure improvements as needed to accommodate projected housing growth, which would generally be funded through the Capital Improvement Program, in turn funded by the General Fund and developer impact and connection fees. Storm drainage infrastructure would be included in this infrastructure planning and development.

Compliance with the General Plan policies and programs would maximize infiltration and rainwater retention, which would in turn reduce stormwater runoff. Additionally, all future development consistent with the Housing Element Update would be evaluated on a project-by-project basis for impacts to storm drain capacity. Further, new development would be required to pay its fair share of the storm drainage system improvement costs. Therefore, impacts related to exceedances in stormwater drainage systems or the creation of substantial additional sources of polluted runoff would be less than significant.

iv) Impacts to Flood Flows

Exhibit 3.9-1 shows the areas that are subject to 100-year and 500-year flooding. Zone 7 is responsible for providing flood protection and water resources to the City. To ensure controlled drainage of the Tri-Valley's surface water runoff, Zone 7 currently manages 39 miles of flood protection channels ranging from concrete-lined channels to natural creeks.²⁰

Most of the potential sites for rezoning are not located within a flood hazard zone, as shown in Exhibit 3.9-1. Site 3 (PUSD-Donlon), 4 (Owens, Motel 6 and Tommy T), 5 Laborer Council), 6 (Signature Center), the southwestern portion of Site 7 (Hacienda Terrace), and the western portion of Sites 22 (Merritt) and 29 (Oracle) are within the 500-year FEMA flood hazard zone. None of the potential sites for rezoning are within the 100-year FEMA flood hazard zone. A small portion of the northwestern portion of the city, within and surrounding the Chain of Lakes, is within the 500-year FEMA flood hazard zone, as well as land on either side of the Arroyo Valle traversing the city from east to west, and land to the east and west of I-680.

²⁰ City of Pleasanton. 2005. 2005 Pleasanton General Plan 2025, Public Safety Element.

The General Plan includes policies and programs specifically designated to address flood hazards. For example, Program 2.2 of the Water Element requires compliance with Zone 7 policies and standards related to restoring riparian corridors when flood control activities require channelization. Similarly, Program 2.2 requires new development to utilize habitat preservation and reclamation measures when designing projects that have flood control included to limit impacts on plants and wildlife. Program 3.6 prohibits new septic systems, automobile dismantlers, waste disposal facilities, industries utilizing toxic chemicals, and other potentially polluting uses in areas that could impact flood waters. Program 9.1 requires new development to pay its fair share of flood control improvements costs included in Zone 7's Master Plan. Additionally, the Public Safety Element includes Goal 4, which requires development to minimize the risks to lives and property due to flood hazards. In support of Goal 4, the General Plan includes Policy 15, which prohibits all development within the 100-year flood zone unless mitigation measures that meet Federal Insurance Administration (FIA) criteria are provided. Further, Program 15.1 requires all development to abide by the regulations of the NFIP. All future development consistent with the Housing Element Update would be required to comply with policies contained in the General Plan.

The Municipal Code also contains rules and regulations to address flood hazards. Chapter 17.08 (Flood Damage Prevention) provides guidance to prevent losses due to flood conditions. Specifically, Section 17.08.040 (Methods of Reducing Flood Losses) provides methods and provisions that control filling, grading, dredging, and other development activity which may increase flood damage. Section 17.08.170 (Standards—Subdivisions) states that all preliminary subdivision proposals shall identify the flood hazard area and final subdivision plans shall minimize flood damage. Section 17.08.190 (Floodways) provides provisions and requirements for development in or near floodways. Section 17.08.140 (Administrator—Duties and Responsibilities) details the flood review that new development must undergo.

Development consistent with the Housing Element Update would be subject to the General Plan policies and programs and the Municipal Code to reduce the risks of flooding. Furthermore, as described above, federal and State agencies are also responsible for maintaining flood protection features in the city. Additionally, all future development consistent with the Housing Element Update would be evaluated on a project-by-project basis for impacts related to flooding and would mitigate impacts as appropriate. Therefore, the potential for loss, injury, or death from impeding flood flows would be less than significant.

Level of Significance

Less than significant impact.

Risk of Pollutant Release Due to Inundation

Impact HYD-4:	Development consistent with the Housing Element Update, rezonings, and General and Specific Plan Amendments would not be located in a flood hazard zone, tsunami, or seiche zone, or risk release of pollutants due to project inundation.
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Inundation by Seiche

Seiches are changes or oscillations of water levels within a confined water body. Seiches are caused by fluctuation in the atmosphere, tidal currents, or earthquakes. The effect of this phenomenon is a

standing wave that would occur when influenced by external causes. There are no large, confined water bodies within the city. Therefore, development consistent with the Housing Element Update would not result in substantial inundation by seiche during a seismic event, and no impact would occur related to a release of pollutants due to inundation by seiche.

Inundation by Flooding

As described in Impact HYD-3, several potential sites for rezoning are within the 100-year flood hazard zone, and a small portion of Site 22 (Merritt) is located within the 500-year flood hazard zone. Thus, all future development consistent with the Housing Element Update would be required to comply with the General Plan policies and programs and Municipal Code requirements described in Impact HYD-3.

As described in more detail in Section 3.8, Hazards and Hazardous Materials, mandatory federal, State, and local regulations govern the storage and use of hazardous materials to ensure appropriate containment to prevent spills. In addition, the General Plan, Public Safety Element, includes Goal 5, which intends to minimize the risk to lives and property due to potential exposure to hazardous materials. Goal 5 includes Policy 16, which regulates the transportation, delivery, use, and storage of hazardous materials within the city limits and Policy 17, which ensures that hazardous materials are not released as a result of construction activities and that any existing hazardous materials and potential contamination are remediated prior to development. All future development consistent with the Housing Element Update would be required to comply with the applicable regulations to reduce the risk of hazardous materials released during inundation and impacts in this regard would be less than significant.

Inundation by Tsunami

A tsunami is a sea wave caused by a submarine earthquake, landslide, or volcanic eruption. Tsunamis can cause catastrophic damage to shallow or exposed shorelines. No portion of the city is located on a shoreline, and thus any future development consistent with the Housing Element Update would not be subject to tsunami and no impact would occur.

Overall

Development consistent with the Housing Element Update would be subject to the General Plan policies and programs and the Municipal Code, which would reduce the risks of inundation. Furthermore, as described above, federal and State agencies are responsible for maintaining flood protection features in the city. Additionally, all future development would be evaluated on a project-by-project basis for impacts related to risk of pollutant release associated with flooding and inundation. Further, consistent with General Plan Public Safety Element Policy 15, all future development in the 100-year flood hazard zone would contain mitigation measures that meet the FIA criteria, and, consistent with Program 9.1, all future development would be required to pay its fair share of flood control improvements costs. Therefore, the risk of release of pollutants during inundation would be less than significant.

Level of Significance

Less than significant impact.

Water Quality Control or Sustainable Groundwater Management Plans Consistency

Impact HYD-5: Development consistent with the Housing Element Update, rezonings, and General and Specific Plan Amendments would not conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan.

The City is within the jurisdiction of the San Francisco Bay RWQCB. The RWQCB has established regulatory standards and objectives for water quality in San Francisco Bay in its Water Quality Control Plan for the San Francisco Bay Basin, commonly referred to as the Basin Plan.

As discussed under Impact HYD-1, construction and operation of any future development consistent with the Housing Element Update would be required to comply with the General Plan policies and programs, the Municipal Code, and the mandatory NPDES permit requirements. Therefore, during construction and operation, future development consistent with the Housing Element Update would not violate any water quality standards or otherwise substantially degrade surface or groundwater quality, in compliance with the Basin Plan. As such, implementation of the Housing Element Update would result in a less than significant impact relative to this topic.

As discussed under Impact HYD-2, future development consistent with the Housing Element Update could lead to an increased demand for water, which could lead to an increase in groundwater pumping. However, the General Plan contains several policies and programs that would facilitate groundwater recharge by encouraging pervious surfaces in new developments and requiring projects to meet federal, State, regional, and local stormwater requirements, including stormwater infiltration. Therefore, implementation of the Housing Element Update would not conflict with or obstruct implementation of a sustainable groundwater management plan and impacts would be less than significant.

Level of Significance

Less than significant impact.

3.9.5 - Cumulative Impacts

The geographic context for an analysis of cumulative impacts is the Eastern Alameda Creek watershed, which encompasses about 675 square miles between Mount Hamilton and Mount Diablo. This analysis evaluates whether impacts of the Housing Element Update, together with impacts of cumulative development, could result in a cumulatively significant impact to hydrology and water quality. This analysis then considers whether incremental contribution of impacts associated with implementation of the Housing Element Update would be significant. Both conditions must apply for a project's cumulative effects to rise to the level of significance.

Cumulative development in the watershed contributes to an incremental increase in impervious surfaces that could introduce pollutants that are typically associated with urban runoff into the stormwater and/or contribute to cumulative flood conditions in the watershed. Cumulative development could also contribute to water quality impacts in the watershed from construction activities. Cumulative impacts would be less than significant because future cumulative development, infrastructure, and planning projects would be subject to local, State, and federal

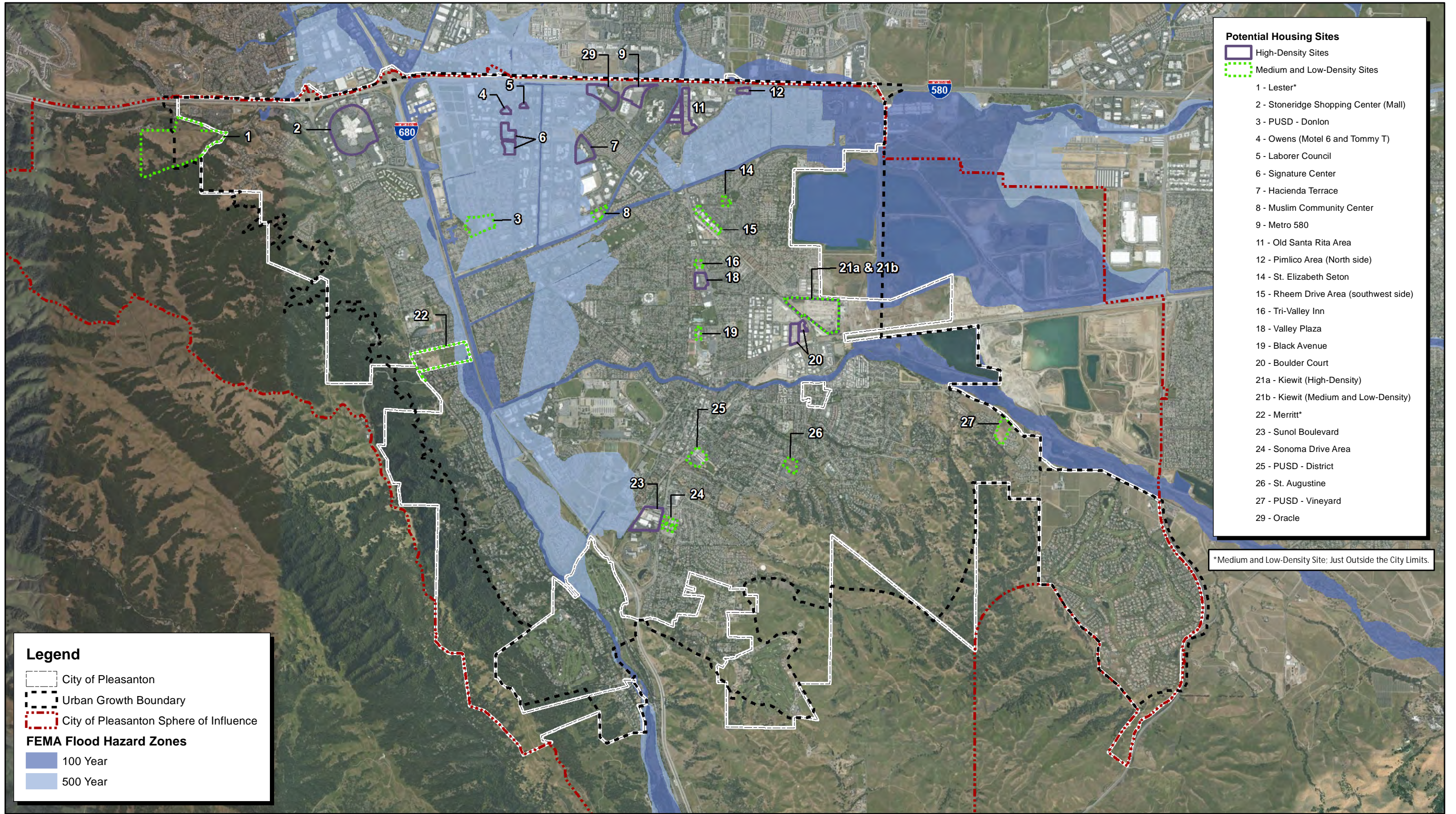
permit requirements and would be required to comply with City and Alameda County ordinances and policies, as well as other water quality regulations that control construction-related and operational discharge of pollutants in stormwater. The water quality regulations implemented by the RWQCB take a basin-wide approach and consider water quality impairment in a regional context that addresses the entire geographic context of the Eastern Alameda Creek Watershed. For these reasons, cumulative impacts to hydrology and water quality would be less than significant.

Moreover, the Housing Element Update's less than significant incremental contribution to less than significant cumulative impacts would not be cumulatively considerable. As discussed above, development resulting from implementation of the Housing Element Update would be subject to General Plan policies and programs and the City's Municipal Code and Zoning Ordinance to reduce hydrology and water quality impacts. As previously discussed, future development consistent with the Housing Element Update would be required to conform to federal, State, and local policies that would reduce hydrology and water quality impacts to less than significant levels. When applicable, any additional new development consistent with the Housing Element Update would be subject, on a project-by-project basis, to independent CEQA review. More specifically, potential changes related to stormwater quality, stormwater flows, drainage, impervious surfaces, and flooding would be minimized by the implementation of stormwater control measures, infiltration, and review by the City Engineer to integrate measures to reduce potential flooding impacts. Therefore, development consistent with the Housing Element Update would not have a cumulatively considerable contribution to a cumulative hydrology impact. For these reasons, the Housing Element Update's contribution to cumulative hydrology and water quality impacts would be less than significant.

Level of Cumulative Significance

Less than significant impact.

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Source: Bing Aerial Imagery, City of Pleasanton, Association of Bay Area Governments (ABAG).



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3.10 - Land Use and Planning

3.10.1 - Introduction

This section of the Draft Program Environmental Impact Report (Draft Program EIR) addresses the consistency of the proposed 2023-2031 (6th Cycle) Housing Element Update, rezonings, General Plan and Specific Plan Amendments (collectively referred to herein as the Housing Element Update) with any land use plan, policy, or regulation which has been adopted for the purpose of avoiding or mitigating an environmental effect. Future projects facilitated by the Housing Element Update will be evaluated for project-specific impacts related to land use and planning at the time they are proposed. Information included in this section is based, in part, on review of applicable land use policies and regulations, most of which are part of the City of Pleasanton General Plan (General Plan).

Once the Housing Element Update is adopted, the General Plan would be amended to include the Housing Element Update. Therefore, all references to the General Plan include the Housing Element Update.

3.10.2 - Environmental Setting

Physical Land Use

The current land use pattern is largely defined by its distinct neighborhoods and topographic features. The geography of the city of Pleasanton reflects the evolving architectural and site design trends of the past 150 years of the city's development. The core of the city is its historic downtown, a walkable grid-based district comprised of numerous buildings that are over 100 years old. Residential neighborhoods dating back to the 1960s comprise much of the city outside the downtown area; these neighborhoods are situated on a curvilinear network of streets and cul-de-sacs. The land uses adjacent to the south of Interstate 580 (I-580) have been largely developed since the 1970s and are composed of business parks and other commercial areas.

As shown in Exhibit 2-2, in Chapter 2, Project Description, the city is generally bounded to the west by Pleasanton ridgelines; to the north by I-580, which runs west to east, and the City of Dublin to the north beyond I-580; to the east by the City of Livermore; and to the south by the San Francisco Water Department lands. Interstate 680 (I-680) runs north to south and bisects the western portion of the city.

Generally, the central areas of the city consist of medium- and high-density residential uses while low-density uses run along the Urban Growth Boundary (UGB) on the west, east, and south sides of the city.

Potential Sites for Housing

The City has identified 25 potential sites to be rezoned that can accommodate future housing to meet the Regional Housing Needs Assessment (RHNA) target. These existing uses, land use designations, and zoning designations for the sites are presented in Table 2-1 in Chapter 2 and

Exhibit 2-3 in Chapter 2, Project Description.¹ Additionally, pursuant to Assembly Bill (AB) 2923, the Dublin-Pleasanton Bay Area Rapid Transit (BART) station property would have an incremental increase in allowable residential units. The potential sites for housing consist of mostly vacant or underutilized parcels. Current development on these sites consists of a mix of uses, including surface parking lots, restaurants, hotels, office buildings, retail, industrial, and warehouse and distribution. The existing General Plan land use designations for the potential sites for housing include residential, commercial, industrial, office, mixed use, open space, community facilities, agriculture, public health and safety, parks and recreation, and public and institutional; existing zoning designations include agriculture, residential, commercial, office, mixed use, industrial, rock sand and gravel extraction, public, and institutional; several of the sites are Planned Unit Development District.

Site 1 (Lester) is just west of the city limits. The eastern portion of the site is within the UGB while the western portion of the site is outside of the UGB. Site 22 (Merritt) is just outside of the city limits and is within the UGB.

3.10.3 - Regulatory Framework

Regional

Plan Bay Area 2050-Sustainable Communities Strategy/Regional Transportation Plan

Plan Bay Area, published by the Metropolitan Transportation Commission (MTC) and Association of Bay Area Governments (ABAG), is a long-range integrated transportation and land use/housing strategy through 2050 for the Bay Area, adopted in October 2021, that serves as the Bay Area's Sustainable Communities Strategy/Regional Transportation Plan (SCS/RTP). Plan Bay Area 2050 is a 30-year plan for nine counties: Alameda, Contra Costa, Marin, Napa, San Francisco, San Mateo, Santa Clara, Solano, and Sonoma. Plan Bay Area 2050 connects the elements of housing, the economy, transportation, and the environment through 35 strategies that will make the Bay Area more equitable for residents and more resilient in the face of unexpected challenges. The 35 strategies are divided among four elements—Housing, Economy, Transportation, and the Environment—that lay out a \$1.4-trillion vision for the Bay Area. Based on extensive analysis and modeling conducted over nearly four years of planning work by MTC and ABAG, Plan Bay Area 2050 is forecasted to make significant progress in tackling the greatest challenges facing the region, from housing affordability to the intensifying impacts of global climate change.

San Francisco Bay Area Rapid Transit District: Transit Oriented Development—Assembly Bill 2923

AB 2923, signed into law in 2018, required the BART Board of Directors to adopt new Transit Oriented Development (TOD) zoning standards for each BART station, establishing minimum local zoning requirements for height, density, parking, and floor area ratio (FAR) only, that apply to an eligible TOD project. AB 2923 requires the adoption of, or amendments to, the TOD zoning standards which must comply with specified requirements and requires affected local jurisdictions to adopt a local zoning ordinance that conforms to the TOD zoning standards and is operative within 2 years of

¹ The numbering of the sites does not correspond to site rankings. The sites are numbered throughout this Draft Program EIR consistent with the numbering provided by the City. Therefore, some numbers are missing because those sites were included in the initial evaluation but removed upon further City discussion.

the date that the TOD zoning standards are adopted by the Board of Directors for a station, or by July 1, 2022, if the Board of Directors has not adopted TOD zoning standards for the station. If local zoning standards conforming to AB 2923 baseline standards were not adopted by that date, then the baseline standards became the local zoning ²

TOD zoning and standards for each BART station were not adopted by BART, and the City has not yet adopted local zoning amendments. Therefore, development at each BART station would need to comply with the AB 2923 baseline standards. Pursuant to AB 2923, the new minimum density of 75 dwelling unit/acre (du/acre) was set for the Dublin-Pleasanton BART station property. The City intends to adopt conforming zoning in compliance with AB 2923 and appropriate planning documents, as appropriate.

Local

Alameda Local Agency Formation Commission

Local Agency Formation Commission (LAFCo) is an independent public agency with countywide jurisdiction, established by State law. LAFCo has approval authority regarding boundary changes to cities and special districts, including annexations, detachments, formations, and incorporations. LAFCo approval is also necessary for changes to a city's Sphere of Influence (SOI), which is reviewed for potential amendment each 5 years as part of an update to the Municipal Services Review by LAFCo, as mandated by State law.

City of Pleasanton

City of Pleasanton General Plan

The General Plan adopted July 21, 2009, and last amended August 20, 2019, provides a blueprint for anticipated growth and the conservation of resources. The General Plan is the official document used by decision-makers and citizens to guide the community's long-range development of land and conservation of resources. The General Plan contains a land use map, policies, and supporting information adequate for making informed decisions concerning the community's future.

The General Plan establishes the following goals, policies, and programs related to land use that are applicable to the Housing Element Update:

Conservation and Open Space Element

- Goal 1** Promote sustainability to preserve and protect natural resources and open space.
- Goal 5** Preserve and protect existing and proposed open space lands for public health and safety recreational opportunities, natural resources, sensitive viewsheds, and biological resources.
- Policy 6** Protect all large continuous areas of open space, as designated on the General Plan Map, from intrusions by urban development.

² Bay Area Rapid Transit (BART). 2022. AB 2923 Implementation. Website: <https://www.bart.gov/about/business/tod/ab2923>. Accessed September 29, 2022.

- Program 6.1** Explore working with the Tri-Valley Conservancy or similar entities to use transfer of development rights and conservation easements to preserve open space.
- Program 6.2** Establish appropriate levels for the development of land adjacent to areas designated as Wildlands Overlay through studies which indicate the types of development posing the least potential negative impact on wildlife habitat.
- Program 6.3** Preserve large blocks of open space land by encouraging the clustering of development.
- Program 6.4** Investigate methods and pursue opportunities to retain areas designated on the General Plan Map as Open Space for permanent open space use through acquisition, conservation easements, establishment of land trusts, etc.
- Program 6.5** Encourage developers to publicly dedicate fee title to open space lands: (1) that are determined to have considerable public recreational, scenic, or natural resource value; (2) where operational costs can be met; and (3) where significant potential health or safety hazards do not exist. Developers should offer public access to the fullest extent possible.

Land Use Element—Overall Community Development

- Goal 2** Achieve and maintain a complete well-rounded community of desirable neighborhoods, a strong employment base, and a variety of community facilities.
- Policy 4** Allow development consistent with the General Land Use Map.
- Program 4.1** Ensure consistency between the General Plan Land Use Map and the zoning designation for all properties within the City’s Sphere of Influence.
- Policy 5** Evaluate land use changes in the context of overall City welfare and goals, as well as the impacts on surrounding neighborhoods.
- Program 5.1** When evaluating development proposals or changes in land use consider General Plan and Specific Plan policies, Zoning and Subdivision Ordinance standards, existing land uses, environmental impacts, safety, aircraft noise, and resident, merchant and property owner concerns.
- Program 5.2** Consider surrounding land uses and potential impacts when changing land use designations

Land Use Element—Residential

- Policy 8** Preserve and enhance the character of existing residential neighborhoods.
- Program 8.1** Enforce the provisions of the City’s Zoning Ordinance and related planning ordinances to maintain the character of existing residential neighborhoods.

Program 8.2 Use the City’s development review procedures to minimize instructions into existing neighborhoods.

Policy 9 Develop new housing in infill and peripheral areas which are adjacent to existing residential development, near transportation hubs or local-serving commercial areas.

Program 9.1 Zone vacant infill sites at densities to facilitate development, which includes affordable housing, while respecting the character of surrounding uses.

Policy 10 Provide flexibility in residential development standards and housing type consistent with the desired community character.

Program 10.1 Use Planned Unit Development (PUD) zoning for residential properties that have unique characteristics or to accommodate development that does not fit under standard zoning classifications.

Policy 11 Residential density is determined by the General Plan density range or applicable specific plan as provided in the General Plan Land Use Element.

Land Use Element—Open Space

Policy 19 Preserve open space areas for the protection of public health and safety, the provision of recreational opportunities, use for agriculture and grazing, the production of natural resources, the preservation of wildlands, and the physical separation of Pleasanton from neighboring communities.

Program 19.1 Preserve open space by way of fee purchase, developer dedications, conservation and scenic easements, transfer of development rights, *Williamson Act* contracts, open space zoning categories, and other means which may become available.

Policy 21 Preserve scenic hillside and ridge views of the Pleasanton, Main, and Southeast Hills ridges.

Land Use Element—Growth Management

Goal 3 Develop in an efficient, logical, and orderly fashion.

Policy 22 Maintain a permanent UGB beyond which urban development shall not be permitted.

Program 22.1 Permit only non-urban uses beyond the Urban Growth Boundary.

Policy 21 Preserve scenic hillside and ridge views of the Pleasanton, Main, and Southeast Hills ridges.

Policy 23 Regulate the number of housing units approved each year to adequately plan for infrastructure and assure City residents of a predictable growth rate.

- Program 23.1** Review and modify the City’s Growth Management Program to ensure an orderly process for developing residential units to ensure that the City’s goals for affordable housing and energy sustainability are met.
- Program 23.2** Prepare a “Growth Management” report as needed on which the City Council can base its Growth Management allocations.
- Policy 24** Annex urbanized pockets of unincorporated land adjacent to the city limits in areas where landowners are willing to accept City services and development standards.
- Policy 25** Encourage development in locations which would complete or install planned public facility systems.
- Program 25.1** Invest in public facilities and amenities that support infill development.
- Program 25.2** Assure that services to existing developed areas are maintained at an acceptable level when new development occurs.

Housing Element

The Housing Element is the primary tool used by the State to ensure local governments are appropriately planning for and accommodating enough housing across all income levels for the planning period 2023-2031. Goals, policies, and programs regarding land use and planning in the Housing Element are provided in Chapter 2, Project Description, specifically, Goals 1, 2, 4, 5, and 6; Policies 1.2, 1.3, 1.4, 1.6, 1.7, 2.3, 2.5, 2.6, 2.7, 2.8, 2.9, 4.1, 4.3, 5.1, 5.4, 5.5, 5.6, 6.1, 6.2, 6.3, and 6.5; and Programs 1.1, 1.3, 1.4, 1.5, 1.6, 1.7, 1.8, 1.9, 1.10, 2.1, 2.2, 2.3, 2.7, 2.9, 2.11, 4.1, 4.2, 4.3, 5.3, 5.6, 6.1, 6.4, 6.5, 6.6 provide guidance for land use and planning.

Vineyard Avenue Corridor Specific Plan

The Vineyard Avenue Corridor Specific Plan was adopted by the City in 1999 and is intended to serve as the primary land use and infrastructure regulatory guide for the development of the 384-acre Vineyard Avenue Corridor area located along Vineyard Avenue in southeast Pleasanton. It establishes a unique agricultural/residential environment featuring a myriad of agricultural, residential, open space, recreational, educational, and other uses.³ It is intended to establish the basic land use pattern, development and design standards, circulation network, infrastructure system, environmental measures, financing, and implementation requirements for future development.

The Vineyard Avenue Corridor Specific Plan establishes the following goals, policies, and programs related to land use that are applicable to the Housing Element Update:

Land Use Objectives

- Objective 1** Establish a mix of land uses that promote the Plan Area as the western entry to the Livermore Valley wine country and provide an appropriate transition between the existing urbanized edge of Pleasanton to the west and the Ruby Hill development to the east.

³ City of Pleasanton. 1999. Vineyard Avenue Corridor Specific Plan.

- Objective 3** Create a strong, recreationally oriented neighborhood that integrates housing with on- and off-site open space, the Arroyo del Valle, Shadow Cliffs Regional Recreation Area, community park, and elementary school.
- Objective 6** Buffer housing from noise, dust, vibration impacts associated with the RMC Lonestar quarrying operation to the north and from traffic noise on Vineyard Avenue.
- Objective 7** Preserve the major ridgeline in the southern Plan Area, limit development of hilltop areas to homes that can be substantially screened from off-site areas, and limit hillside development to areas that can physically and visually accommodate it without disrupting the natural character of the site.
- Objective 9** Establish a unified site planning, architectural, and landscape character for the future development of Lots 18, 19, 21, and 28 that draws from the character of the Livermore Valley wine country, the approval Ruby Hill architectural design concepts, and the traditions of Southern European “vineyard village” design.

Hacienda PUD Development Plan Design Guidelines

The Hacienda Planned Unit Development (PUD) area is generally located south of Interstate 580 (I-580), west of Tassajara Creek, north of W. Las Positas Boulevard, and east of Hopyard Road. The Hacienda PUD Development Plan Design Guidelines (Hacienda Design Guidelines) ensure that development within the Hacienda PUD area promotes the best interests of the public’s health, safety, and general welfare, is consistent with the General Plan, compatible with existing developed properties, presents a positive image for the city along the I-580 frontage, and development within the Hacienda PUD area conform to the purpose of the PUD. Parcel 5D corresponds to Site 5 (Laborer Council), Parcel 9 corresponds to Site 7 (Hacienda Terrace), Parcel 18B to Site 8 (Muslim Community Center), Parcel 58C to Site 9 (Metro 580), and Parcel 56C corresponds to Site 29 (Oracle). Section 2 provides site planning guidelines, which includes land use plan/zoning (Section 2.1); site zone definitions (Section 2.2); front, side, and rear yard designations (Section 2.4); building and parking area setbacks (Section 2.5); and development standards for housing and TOD sites (Section 2.11).

Pleasanton Municipal Code

The Pleasanton Municipal Code sets forth regulations to ensure that development and land use activities protect and promote the health, safety, comfort, convenience, prosperity, and general welfare of residents and businesses in the city. The Municipal Code consists of all ordinances adopted by the Pleasanton City Council.

Pleasanton Zoning Ordinance

The Pleasanton Zoning Ordinance, Chapter 18 of the City Municipal Code has been enacted to provide a precise guide for the physical development of the city to achieve the arrangement of land uses depicted in the General Plan. The ordinance also promotes the stability of existing land uses that conform with the General Plan “to protect them from inharmonious influences and harmful intrusions.”

The Zoning Ordinance indicates that a Planned Unit Development (PUD) District is intended to encourage imagination and housing variety in the development of property of varying sizes and topography, avoiding the monotony of standard residential, commercial, and industrial developments. The PUD procedure ensures that the desires of the developer and the community are understood and approved prior to commencement of construction.

Urban Growth Boundary (Measure FF)

In November 1996, the voters approved Measure FF, requiring voter approval for all but minor refinements to the City's UGB. Areas outside the UGB line are generally suitable for the long-term protection of natural resources, large-lot agriculture and grazing, parks, and recreation, and similar uses. Policy 22 of Chapter 2, Land Use Element, of the General Plan, does not allow urban development beyond the UGB line.

The UGB in relation to the potential sites for rezoning is shown in Exhibit 2-3, in Chapter 2, Project Description, and the UGB in relation to the Dublin-Pleasanton BART station property is provided in Figure 2-1 in the Project Description. All the potential sites for housing are within the UGB apart from Site 22 (Merritt); the eastern half of Site 22 (Merritt) is within the UGB while the western half lies just outside the UGB.

City of Pleasanton Measures PP and QQ

In the November 2008 general election, voters adopted two ballot measures regarding General Plan policy:⁴

1. Save Pleasanton's Hills and Housing Cap (Measure PP), a voter initiative; and
2. The Pleasanton Ridgelines Protection and Growth Control Initiative (Measure QQ), a City Council measure.

These two measures were incorporated into the General Plan. Measure PP limits the placement of housing units and structures on slopes of 25 percent or greater or within 100 vertical feet of a ridgeline and further limits grading on slopes of 25 percent or more or within 100 feet of a ridgeline to build residential or commercial structures. Measure PP also exempts from these restrictions projects of 10 or fewer housing units on property that constitutes a single legal parcel, as of January 1, 2007.

Measure QQ reaffirms and readopts policies in the then existing General Plan to: (A) preserve scenic hillside and ridge views of specific ridges; (B) study the feasibility of preserving large open space areas in the Southeast Hills; and (C) protect large contiguous areas designated as Open Space in the General Plan.

With the adoption of Measure PP, its provisions are included in the General Plan as follows:

⁴ As subsequent litigation determined that Pleasanton's earlier voter-adopted housing cap was in conflict with State law, those portions of Measures PP and QQ related to the housing cap are not discussed here.

Land Use Element

Program 21.3 Ridgelines and hillsides shall be protected. Housing units and structures shall not be placed on slopes of 25 percent or greater, or within 100 vertical feet of a ridgeline. No grading to construct residential or commercial structures shall occur on hillside slopes 25 percent or greater, or within 100 vertical feet of a ridgeline. Exempt from this policy are housing developments of 10 or fewer units on a single property. Splitting, dividing, or subdividing a “legal parcel” to approve more than 10 housing units is not allowed.

With the adoption of Measure QQ, the re-adopted policies and program are set forth in the General Plan, as shown below.

Policy 21 Preserve scenic hillside and ridge views of the Pleasanton, Main and Southeast Hills ridges.

Program 21.2 Study the feasibility of preserving large open space areas in the Southeast Hills by a combination of private open space and a public park system.

Open Space Element

Policy 6 Protect all large continuous areas of open space, as designated on the General Plan Map, from intrusion by urban development.

3.10.4 - Impacts and Mitigation Measures

Significance Criteria

The City is utilizing California Environmental Quality Act (CEQA) Guidelines Appendix G as thresholds of significance for evaluating impacts associated with the Housing Element Update. To determine whether impacts related to land use and planning are significant environmental effects, the following questions are analyzed and evaluated. Would the Housing Element Update:

- a) Physically divide an established community?
- b) Cause a significant environmental impact due to a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect?

Approach to Analysis

Analysis in this section focuses on whether development consistent with the Housing Element Update, rezonings, and Specific Plan Amendments would physically divide an established community and whether the Housing Element Update would conflict with land use plans, policies, or regulations adopted to avoid or mitigate an environmental effect. Conflicts and inconsistencies with a policy, in and of themselves, do not constitute significant environmental impacts for purposes of the CEQA. Rather, it is only where (1) there is a conflict or inconsistency that (2) involves a policy that was adopted for the purpose of avoiding or mitigating an environmental effect, and (3) a conflict with such a policy results in a significant environmental impact. Environmental impacts that would result from the Housing Element Update in other environmental topic areas are discussed throughout

Chapter 3 of this Draft Program EIR. The potential for land use impacts was assessed through review of applicable land use policy documents.

Impact Evaluation

Divide an Established Community

Impact LAND-1: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not physically divide an established community.

The physical division of an established community would occur if development consistent with the Housing Element Update would involve construction of a large linear feature, such as a railroad or interstate highway, or if it would involve removal of access that would impact mobility within an existing community, such as removal of a bridge. Implementation of the Housing Element Update would allow for residential development on the potential sites, many of which do not currently allow residential uses and a minimum density of 75 du/acre for the Dublin-Pleasanton BART station property, a site that currently is zoned for a density of 30-35 du/acre. These potential sites for rezoning were chosen by the City based on certain criteria that makes the sites suitable for residential development. These criteria include: (1) site size and infill criteria, (2) proximity to modes of transportation, (3) proximity to services and amenities, (4) environmental impacts/hazards, (5) impacts on sensitive resources, (6) height and mass compatibility, and (7) interest in the site. As part of this analysis, the City determined potential sites for rezoning that would allow housing developments on locations that would be integrated into, and would not divide, any established neighborhoods within the city. The Dublin-Pleasanton BART station property would include an increase in density as described above and in Chapter 2, Project Description, in compliance with AB 2923.

The Housing Element Update contains a multitude of policies and actions to require and ensure community connectivity as buildout occurs. Program 1.7 facilitates the development of Site 2 (Stoneridge Shopping Center, Mall) and 21 a and b (Kiewit) and requires the City to adopt a Specific Plan, Master Plan, or PUD plan for each site. The development of these infill sites in conjunction with an overall plan will facilitate the construction of neighborhoods within the existing urban fabric of the city. Policy 4.2 requires the City to ensure adequate infrastructure if available to support future planned residential growth. Policy 6.1 requires high-density housing to be built throughout the community, in areas near public transit, major thoroughfares, shopping, and employment centers, and Policy 6.3 and 6.5 encourage residential infill in areas where public facilities, such as public transit and the active transportation network, are or can be made adequate to support such development where such facilities exist. Therefore, high-density housing would take place within the existing, established community with access to existing public amenities. Program 1.3 requires the City to adopt zoning standards consistent with the BART TOD Place Type: Neighborhood/Town Center for AB 2923-eligible parcels within a half-mile of the West Dublin/Pleasanton and Dublin/Pleasanton BART stations and provides other initiatives regulating the development of that parcel. Program 1.3 would require the logical and orderly development of that parcel in compliance with AB 2923. Furthermore, the Housing Element Update does not propose any changes to the

roadway circulation network such that new or expanded roadways are contemplated. For these reasons, impacts would be less than significant.

Level of Significance

Less than significant impact.

Conflict with Applicable Plans, Policies, or Regulations

Impact LAND-2: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not cause a significant environmental impact due to a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect.

Plan Bay Area 2050-Sustainable Communities Strategy/Regional Transportation Plan Consistency

Plan Bay Area 2050 provides growth forecasts for population, households, and jobs within the Bay Area, which informs the RHNA. The RHNA is based on the growth forecasts as provided in Plan Bay Area 2050 and, therefore, adheres to Senate Bill 375, approved by the legislature in 2008, which requires consistency between regional transportation plans and regional housing plans. As described in the Final RHNA Plan: San Francisco Bay Area, 2023-31, ABAG/MTC staff developed a “framework for evaluating consistency between RHNA and Plan Bay Area 2050. This approach compares the 8-year RHNA allocations to the 35-year housing growth from the Plan Bay Area 2050 Final Blueprint at the county and subcounty geographies used in the plan. If the 8-year growth level from RHNA does not exceed the 35-year housing growth level at either of these geographic levels, then RHNA and Plan Bay Area 2050 will be determined to be consistent. Staff evaluated the final RHNA methodology using this approach and determined that the RHNA allocation is consistent with Plan Bay Area.” The Report further notes that “the final RHNA methodology and Plan Bay Area 2050 are consistent for all nine counties and in 33 of 34 superdistricts (i.e., sub-county areas) using the methodology developed during the [Housing Methodology Committee] HMC process. In the one superdistrict flagged during the consistency check, the Final Blueprint reflects the loss of more than 1,000 homes in wildfires since 2015. Anticipated reconstruction of these units during the RHNA period does not yield significant net growth in housing units, making these allocations consistent with the Final Blueprint long-range projections.”⁵

Consistent with Plan Bay Area 2050, the Housing Element Update includes several policies and programs intended to improve the quality of the housing inventory, conserve existing neighborhoods, increase housing affordability, and remove potential governmental and non-governmental constraints to housing for lower-income households and persons with special needs. For example, Policy 6.1 would increase housing options while preserving existing neighborhoods by dispersing high-density housing throughout the community. This policy would focus on increasing housing in areas near public transit, major thoroughfares, shopping, and employment centers and ensure that livability is considered when considering proposals for high-density residential developments, including open space, amenities, and facilities for the intended occupants. Plan Bay Area 2050 also emphasizes opportunities for new housing in aging shopping centers and office

⁵ Association of Bay Area Governments (ABAG). 2021 (updated March 2022). Final Regional Housing Needs Allocation (RHNA) Plan: San Francisco Bay Area, 2023-31, page 14 and page 48 (Footnote 12).

complexes; many of the potential site for housing propose exactly this type of strategy, with redevelopment of existing, underutilized commercial properties.

Additionally, Policy 2.3 would advance the Inclusionary Zoning Ordinance by requiring each residential and non-residential development to which the Ordinance applies to include its pro-rata share of housing needs for lower- and moderate-income households or, if the Ordinance criteria are met, to contribute to the Lower Income Housing Fund or propose alternative methods to facilitate the construction of housing affordable to these groups. This policy strongly encourages that the Inclusionary Zoning Ordinance requirements be met by building housing affordable to lower- and moderate-income households. The City will continue to offer incentives to encourage and facilitate the production of affordable inclusionary units as a component of the Ordinance.

Moreover, Policy 5.6 improves the quality of housing choices for all residents by encouraging the development of residential units that are accessible to persons with disabilities or are adaptable for conversion to residential use by persons with disabilities. Program 5.3 helps to implement this policy by providing regulatory incentives, such as expedited permit processing in conformance with the Community Care Facilities Act and fee reductions where the development would result in an agreement to provide below-market housing or services. Further, the City provides fee reductions per Pleasanton Municipal Code Chapter 18.86 (Reasonable Accommodations) on the basis of hardship. The City will maintain flexibility within the Zoning Ordinance to permit such uses in nonresidential zoning districts. Individual development projects would also be subject to relevant General Plan Housing Element Policies and Municipal Code requirements regarding growth management to ensure that residential development is consistent with the City's infrastructure capacity.

Furthermore, the potential sites for rezoning were determined through a site evaluation performed by the City, based on seven different criteria that considered the 35 strategies set forth in Plan Bay Area 2050. These criteria include the following: (1) site size and infill criteria, (2) proximity to modes of transportation, (3) proximity to services and amenities, (4) environmental impacts/hazards, (5) impacts on sensitive resources, (6) height and mass compatibility, and (7) interest in site.

The sites that were chosen to promote infill development in areas with proximity to existing transit and services and amenities. The Dublin-Pleasanton BART station property would include an increase in density at a TOD site as described above and in Chapter 2, Project Description, in compliance with AB 2923. Consistency with the RHNA and a focus on concentrating future housing development in these areas would reduce environmental impacts, consistent with Plan Bay Area 2050. Therefore, impacts would be less than significant.

City of Pleasanton General Plan, PUD, and Specific Plan Consistency

The existing General Plan Land Use designation for each site is provided in Exhibit 2-4a in Chapter 2, Project Description, and the proposed General Plan Land Use is provided in Exhibit 2-5a in Chapter 2, Project Description. The Dublin-Pleasanton BART station property is currently designated Mixed Use/Business Park. The Mixed Use/Business Park designation allows for residential uses in a single building, on a single site, or on adjacent sites where uses are integrated and include a functional interrelationship and coherent physical design. Higher density residential uses (30 du/acre or more)

are encouraged at locations in proximity to BART stations; further, pursuant to AB 2923 a housing development of 75 du/acre would be allowed at the Dublin-Pleasanton BART station property.

Development on most of the potential sites for rezoning would require a General Plan Amendment. Development within Hacienda on Sites 5 (Laborers Council), 7 (Hacienda Terrace), 8 (Muslim Community Center), 9 (Metro 580), and 29 (Oracle), could also require an Amendment of the Hacienda PUD Plan. Development of Site 27 (PUSD Vineyard) could also require amendment of the Vineyard Avenue Corridor Specific Plan. The proposed General Plan, PUD, and Specific Plan Amendments would be consistent with widely accepted planning principles of facilitating logical and orderly growth, ensuring compatibility with surrounding uses, and ensuring internal consistency among the goals and policies of the General Plan, Hacienda PUD Plan, and Vineyard Avenue Corridor Specific Plan. When a project entails an amendment to a general plan or specific plan, inconsistency with the existing designation provided in a General Plan or specific plan is an element of the project itself, which then necessitates a legislative policy decision by the agency and does not signify a potential environmental effect. Moreover, as the City receives development applications for subsequent development consistent with the Housing Element Update, those applications would be reviewed by the City for compliance with the goals, policies, and programs of the General Plan and Hacienda PUD Plan and Vineyard Avenue Corridor Specific Plan, as applicable. As such, if approved, the proposed General Plan, PUD, and Specific Plan Amendments would serve as a self-mitigating aspect of the Housing Element Update that would correct conflicts that would otherwise exist, and impacts would be less than significant.

Zoning

The existing zoning designation for each site is provided in Exhibit 2-4b and the proposed zoning is provided in Exhibit 2-5b. All the potential sites for rezoning would be rezoned to allow for residential development under a PUD district. The Dublin-Pleasanton BART station property is currently zoned Planned Unit Development-Mixed Use (PUD-MU), but allowable density would increase in line with that required to be permitted under AB 2923. Several of the sites are within PUD district, and as part of the Housing Element Update, the potential sites for rezoning would be rezoned to allow for residential development under a PUD district. To the extent projects may be subject to review through the PUD process, the PUD zoning would provide flexibility in residential development standards and housing types, in alignment with the applicable objective design standards established by the City with the intent of ensuring such projects are developed in a manner that meets desired community character and are compatible with existing development.

The Housing Element Update includes policies and programs that are meant to ensure logical and orderly development and require discretionary review consistent with the Pleasanton Zoning Ordinance. For instance, Policy 4.1 of the Housing Element Update would result in the development of guidelines and standards for residential and mixed-use development that would incorporate objective standards whenever possible which would ensure one set of objective standards used to evaluate all projects (Program 4.2). With respect to the sites zoned for densities above 30 du/acre, which includes the Dublin-Pleasanton BART station property, Policy 6.1 requires those properties to be dispersed throughout the community. As described in Chapter 2, Project Description, the potential sites for rezoning were chosen based on seven criteria, and as shown in Exhibit 2-3, the

high-density sites are dispersed throughout the city, consistent with Policy 6.1. Program 6.1 requires the City to adopt Objective and Design and Development Standards that would ensure that properties are developed at appropriate height limits, with compatible FARs, setbacks, massing, open space and parking requirements, and also includes approval criteria to ensure that projects can achieve their assigned densities while mitigating potential incompatibilities between those higher density projects and adjacent uses by implementing standards such as height limits, FAR, setbacks, massing, and open space. This would ensure that high-density projects are compatible with existing development. Moreover, as the City receives development applications for subsequent development consistent with the Housing Element Update, those applications would be reviewed by the City for compliance with the goals, policies, and programs of the Municipal Code.

As such, if approved, the proposed rezonings would serve as a self-mitigating aspect of the project that would serve to correct conflicts that would otherwise exist, and impacts would be less than significant.

Annexation

All the potential sites for housing are located within the incorporated area, except for Sites 1 (Lester) and 22 (Merritt). Site 22 (Merritt) is just outside of the city limits, but within Pleasanton's SOI and UGB. Site 1 (Lester) is also located just outside of the city limits, and the western half of Site 1 (Lester) is located just outside the UGB (Exhibit 2-2 in Chapter 2, Project Description). Prior to development on those sites, they would need to be annexed into the City of Pleasanton consistent with City and LAFCo policies as well as Program 1.10 of the Housing Element. Site 1 (Lester) is currently designated as Residential-Low Density (LDR), Agriculture and Grazing (A), Public Health and Safety (PHS), while Site 22 (Merritt) is currently designated LDR, reflecting the residential development vision for these two properties. Annexation of these two properties would represent a logical and orderly extension of urban growth and the City's boundaries which would ensure the two properties would be developed in a comprehensive and thoughtful manner consistent with other nearby lands. Moreover, as the City receives development applications consistent with the Housing Element Update for Sites 1 (Lester) and 22 (Merritt), those applications would be reviewed by the City for compliance with the goals, policies, and programs of the General Plan and Municipal Code. Furthermore, LAFCo would review the development applications for Sites 1 (Lester) and 22 (Merritt) to ensure consistency with LAFCo policies, and impacts would be less than significant.

Urban Growth Boundary (Measure FF)

All the potential sites for housing are within the UGB apart from Site 22 (Merritt). The eastern half of Site 22 (Merritt) is within the UGB while the western half lies just outside the UGB. Pursuant to Policy 22 of Chapter 2, Land Use Element, of the General Plan, no development within this site would occur beyond the UGB. Once the City receives a development application for this site, it would be reviewed by the City for compliance with the goals, policies, and programs of the General Plan, including Policy 22. Therefore, impacts would be less than significant.

City of Pleasanton Measures PP and QQ

The central purpose of Measure PP is to protect the natural and scenic environment. Measure PP limits the placement of housing units and structures on slopes of 25 percent or greater or within 100

vertical feet of a ridgeline. Aside from Site 1 (Lester), the sites are not located near slopes of 25 percent or greater or within 100 vertical feet of a ridgeline and they are not near scenic hillsides. Site 1 (Lester) may contain slopes of 25 percent or be within 100 feet of a ridgeline. Pursuant to Measure PP and Program 21.3 of Chapter 2, Land Use Element, of the General Plan, no development within this site would occur on slopes of 25 percent or greater or within 100 vertical feet of a ridgeline. The City has received a residential development application for Site 1 (Lester), and, prior to the issuance of building permits, it would be reviewed by the City for compliance with the goals, policies, and programs of the General Plan, including Program 21.3. On this basis, the Housing Element Update would not conflict with Measure PP. Consistent with the General Plan, individual development projects would be required to undergo project-specific discretionary environmental review with respect to annexation and development in the City of Pleasanton, including additional analysis to determine consistency with Measure PP.

Measure QQ aims to (A) preserve scenic hillside and ridge views of specific ridges (i.e., Pleasanton, Main, and Southeast Hills); (B) study the feasibility of preserving large open space areas in the Southeast Hills; and (C) protect large contiguous areas designated as Open Space in the General Plan. As described in Section 3.1, Aesthetics, views of Pleasanton ridge and other scenic hillsides and ridge views may be available from some of the potential sites for rezoning, as those scenic hillsides and ridge views are at a number of locations throughout Pleasanton; however, the design review process and application of existing and future design guidelines and standards, would help to preserve those views and ensure development would not conflict with or diminish the existing scenic quality. None of the sites include large open space areas in the Southeast Hills or are designated as Open Space in the General Plan. Consistent with the General Plan, individual development projects would be required to undergo project-specific environmental review, which may require additional analysis to confirm consistency with Measure QQ.

Therefore, development consistent with the Housing Element Update would not conflict with Measures PP or QQ and impacts would be less than significant.

Airport Land Use Compatibility Plan

The Livermore Municipal Airport is located approximately 1 mile east of the City of Pleasanton, and some areas of the city are within the flight path for planes taking off and arriving at the Livermore Airport. As shown in Exhibit 3.8-2, in Section 8, Hazards and Hazardous Materials, Sites 12 (Pimlico Area, North side), 14 (St. Elizabeth Seton), 15 (Rheem Drive Area, southwest side), 21a and b (Kiewit) are located within the Alameda County Airport Land Use Policy Plan's Airport Influence Area (AIA), which is coterminous with the Alameda County Airport Land Use Commission Hazard Prevention Zone. None of the potential sites for housing are within an Airport Protection Area.

Pursuant to Goal 6, Policy 20, and Program 20.1 of Chapter 5, Public Safety, of the General Plan, the developments within the Alameda County Airport Land Use Policy Plan (ALUPPs) AIA would be required to undergo federal, State, and local regulatory review processes specific to airport noise, airspace safety, and other land use compatibility standards, including 14 Code of Federal Regulations Part 77 regulations for the safety, efficient use, and preservation of navigable airspaces. Sites 12 (Pimlico Area, North side), 14 (St. Elizabeth Seton), 15 (Rheem Drive Area, southwest side), 21a and b (Kiewit) would be evaluated for consistency with the 2011 California Airport Land Use Planning

Handbook and the Alameda County Airport Land Use Compatibility Plan (ALUCP). In reviewing individual project applications, the City would determine which policies and actions apply and whether project modifications would be required to ensure compatibility with the ALUCP, depending on the specific characteristics of the project type and/or project site during the development review process. Buildings within the ALUCP AIA would be required to comply with Federal Aviation Administration (FAA) regulations for height. Therefore, development consistent with the Housing Element Update would be consistent with the Alameda County ALUCP and impacts would be less than significant.

Overall

Overall, the development consistent with the Housing Element Update would not conflict with applicable land use plans, policies, or regulations that were adopted for the purpose of avoiding or mitigating an environmental effect. Therefore, impacts would be less than significant.

Level of Significance

Less than significant impact.

3.10.5 - Cumulative Impacts

The geographic scope of the cumulative impact analysis for land use and planning is the Tri-Valley Planning Area, which includes the City of Pleasanton as well as the surrounding cities of Dublin, Livermore, and San Ramon and the Town of Danville. This analysis evaluates whether the impacts of the Housing Element Update, together with the impacts of cumulative development, would result in a cumulatively significant impact related to land use and planning. This analysis then considers whether incremental contribution to cumulative impacts associated with the implementation of the Housing Element Update would be significant. Both conditions must apply for a project's cumulative effects to rise to a level of significance.

Development within the Tri-Valley area is governed by the applicable plans, programs, policies, and land use planning regulations which ensure logical and orderly development and require discretionary review to ensure that projects do not divide an established community or result in environmental impacts due to inconsistency with applicable land use planning regulations including, but not limited to, the General Plans for the cities of Pleasanton, Livermore, San Ramon and the Town of Danville and any applicable Specific Plans. Cumulative development would also adhere to applicable policies of the applicable municipal codes. Conformance with these land use planning regulations would be confirmed during project approval. For these reasons, cumulative projects would have a less than significant cumulative effect.

Development consistent with the Housing Element Update would be required to demonstrate consistency with the City of Pleasanton General Plan and applicable specific plans and applicable codes, ordinances, and policies, which would ensure logical and orderly development that would not divide an established community and would require discretionary review to ensure that development would not result in environmental impacts due to inconsistency with the City of Pleasanton General Plan and applicable specific plans and applicable codes, ordinances, and policies and other land use

planning regulations. For these reasons, the Housing Element Update's incremental contribution to the less than significant cumulative impacts would be considered less than significant.

Level of Cumulative Significance

Less than significant impact.

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3.11 - Noise

3.11.1 - Introduction

This section describes the existing noise setting and addresses potential environmental effects related to noise from implementation of the proposed 2023-2031 (6th Cycle) Housing Element Update, rezonings, and General Plan and Specific Plan Amendments (collectively referred to herein as the Housing Element Update). Future projects consistent with the Housing Element Update will be evaluated for project-specific impacts related to noise at the time they are proposed. Descriptions and analysis in this section are based on noise modeling performed by FirstCarbon Solutions (FCS), review of the City of Pleasanton General Plan (General Plan) and the Pleasanton Municipal Code (Municipal Code). Once the Housing Element Update is adopted, the General Plan would be amended to include the Housing Element Update. Therefore, all references to the General Plan include the Housing Element Update. The noise modeling output is included in this Draft Environmental Impact Report (Draft EIR) as Appendix F.

3.11.2 - Environmental Setting

Characteristics of Noise

Noise is generally defined as unwanted or objectionable sound. Sound becomes unwanted when it interferes with normal activities, when it causes actual physical harm, or when it has adverse effects on health. The effects of noise on people can include general annoyance, interference with speech communication, sleep disturbance, and, in the extreme, hearing impairment. Noise effects can be caused by pitch or loudness. Pitch is the number of complete vibrations or cycles per second of a wave that result in the range of tone from high to low; higher-pitched sounds are louder to humans than lower-pitched sounds. Loudness is the intensity or amplitude of sound.

Sound is produced by the vibration of sound pressure waves in the air. Sound pressure levels are used to measure the intensity of sound and are described in terms of decibels. The decibel (dB) is a logarithmic unit, which expresses the ratio of the sound pressure level being measured to a standard reference level. The 0 point on the dB scale is based on the lowest sound level that the healthy, unimpaired human ear can detect. Changes of 3 dB or less are only perceptible in laboratory environments. Audible increases in noise levels generally refer to a change of 3 dB or more, as this level has been found to be barely perceptible to the human ear in outdoor environments. Only audible changes in existing ambient or background noise levels are considered potentially significant.

The human ear is not equally sensitive to all frequencies within the audible sound spectrum, so sound pressure level measurements can be weighted to better represent frequency-based sensitivity of average healthy human hearing. One such specific “filtering” of sound is called “A-weighting.” A-weighted decibels (dBA) approximate the subjective response of the human ear to a broad frequency noise source by discriminating against very low and very high frequencies of the audible spectrum. They are adjusted to reflect only those frequencies that are audible to the human ear. Because decibels are logarithmic units, they cannot be added or subtracted by ordinary arithmetic means. For example, if one noise source produces a noise level of 70 dB, the addition of another

noise source with the same noise level would not produce 140 dB; rather, they would combine to produce a noise level of 73 dB.

Noise Descriptors

There are many ways to rate noise for various intervals, but an appropriate rating of ambient noise affecting humans also accounts for the annoying effects of sound. Equivalent continuous sound level (L_{eq}) is the total sound energy of time-varying noise over a sample period. However, the predominant rating scales for human communities in the State of California are the L_{eq} and Community Noise Equivalent Level (CNEL) or the day-night average level (L_{dn}) based on dBA. CNEL is the time-varying noise over a 24-hour period, with a 5 dBA weighting factor applied to the hourly L_{eq} for noises occurring from 7:00 p.m. to 10:00 p.m. (defined as relaxation hours) and a 10 dBA weighting factor applied to noise occurring from 10:00 p.m. to 7:00 a.m. (defined as sleeping hours). L_{dn} is similar to the CNEL scale but without the adjustment for events occurring during the evening hours. CNEL and L_{dn} are within one dBA of each other and are normally interchangeable. The noise adjustments are added to noise events occurring during the more sensitive hours.

Other noise rating scales of importance when assessing the annoyance factor include the maximum noise level (L_{max}), which is the highest exponential time-averaged sound level that occurs during a stated time period. The noise environments discussed in this analysis are specified in terms of maximum levels denoted by L_{max} for short-term noise impacts. L_{max} reflects peak operating conditions and addresses the annoying aspects of intermittent noise.

Noise Propagation

From the noise source to the receiver, noise changes both in level and frequency spectrum. The most obvious is the decrease in noise as the distance from the source increases. The way noise reduces with distance depends on whether the source is a point or line source, as well as ground absorption, atmospheric conditions (wind, temperature gradients, and humidity) and refraction, and shielding by natural and manmade features. Sound from point sources, such as an air conditioning condenser, a piece of construction equipment, or an idling truck, radiates uniformly outward as it travels away from the source in a spherical pattern.

The attenuation or sound drop-off rate is dependent on the conditions of the land between the noise source and receiver. To account for this ground-effect attenuation (absorption), two types of site conditions are commonly used in noise models: soft-site and hard-site conditions. Soft-site conditions account for the sound propagation loss over natural surfaces such as normal earth and ground vegetation. For point sources, a drop-off rate of 7.5 dBA/DD is typically observed over soft ground with landscaping, as compared with a 6 dBA/DD drop-off rate over hard ground such as asphalt, concrete, stone, and very hard packed earth. For line sources, such as traffic noise on a roadway, a 4.5 dBA/DD is typically observed for soft-site conditions compared to the 3 dBA/DD drop-off rate for hard-site conditions. Table 3.11-1 briefly defines these measurement descriptors and other sound terminology used in this section.

Table 3.11-1: Sound Terminology

Term	Definition
Sound	A vibratory disturbance created by a vibrating object which, when transmitted by pressure waves through a medium such as air, can be detected by a receiving mechanism such as the human ear or a microphone.
Noise	Sound that is loud, unpleasant, unexpected, or otherwise undesirable.
Ambient Noise	The composite of noise from all sources near and far in a given environment.
Decibel (dB)	A unitless measure of sound on a logarithmic scale, which represents the squared ratio of sound pressure amplitude to a reference sound pressure. The reference pressure is 20 micropascals, representing the threshold of human hearing (0 dB).
A-Weighted Decibel (dBA)	An overall frequency-weighted sound level that approximates the frequency response of the human ear.
Equivalent Noise Level (L_{eq})	The average sound energy occurring over a specified time period. In effect, L_{eq} is the steady-state sound level that in a stated period would contain the same acoustical energy as the time-varying sound that actually occurs during the same period.
Maximum and Minimum Noise Levels (L_{max} and L_{min})	The maximum or minimum instantaneous sound level measured during a measurement period.
Day/Night Average Sound Level (L_{dn})	The energy average of the A-weighted sound levels occurring during a 24-hour period, with 10 dB added to the A-weighted sound levels occurring between 10:00 p.m. and 7:00 a.m. (nighttime).
Community Noise Equivalent Level (CNEL)	The energy average of the A-weighted sound levels occurring during a 24-hour period, with 5 dB added to the A-weighted sound levels occurring between 7:00 p.m. and 10:00 p.m. and 10 dB added to the A-weighted sound levels occurring between 10:00 p.m. and 7:00 a.m.
Source: Data compiled by FirstCarbon Solutions (FCS) 2022.	

Traffic Noise

The level of traffic noise depends on the three primary factors: (1) the volume of the traffic, (2) the speed of the traffic, and (3) the number of trucks in the flow of traffic. Generally, the loudness of traffic noise is increased by heavier traffic volumes, higher speeds, and a greater number of trucks. Vehicle noise is a combination of the noise produced by the engine, exhaust, and tires. Because of the logarithmic nature of noise levels, a doubling of the traffic volume (assuming that the speed and truck mix do not change) results in a noise level increase of 3 dBA. Based on the Federal Highway

Administration (FHWA) community noise assessment criteria, this change is “barely perceptible”; for reference, a doubling of perceived noise levels would require an increase of approximately 10 dBA. The truck mix on a given roadway also influences community noise levels. As the number of heavy trucks increases and becomes a larger percentage of the vehicle mix, adjacent noise levels increase.

Stationary Noise

A stationary noise producer is any entity in a fixed location that emits noise. Examples of stationary noise sources include machinery, engines, energy production, and other mechanical or powered equipment and activities such as loading and unloading or public assembly that may occur at commercial, industrial, manufacturing, or institutional facilities. Furthermore, while noise generated by the use of motor vehicles over public roads is preempted from local regulation, the use of these vehicles is considered a stationary noise source when operated on private property such as at a construction site, a truck terminal, or warehousing facility. The emitted noise from the producer can be mitigated to acceptable levels either at the source or on the adjacent property through the use of proper planning, setbacks, block walls, acoustic-rated windows, dense landscaping, or by changing the location of the noise producer.

The effects of stationary noise depend on factors such as characteristics of the equipment and operations, distance and pathway between the generator and receptor, and weather. Stationary noise sources may be regulated at the point of manufacture (e.g., equipment or engines), with limitations on the hours of operation or with provision of intervening structures, barriers, or topography.

Construction activities are a common source of stationary noise. Construction-period noise levels are higher than background ambient noise levels but eventually cease once construction is complete. Construction is performed in discrete steps, each of which has its own mix of equipment and, consequently, its own noise characteristics. These various sequential phases would change the character of the noise generated on each construction site and, therefore, would change the noise levels as construction progresses. Despite the variety in the type and size of construction equipment, similarities in the dominant noise sources and patterns of operation allow construction-related noise ranges to be categorized by work phase. Table 3.11-2 shows typical noise levels of construction equipment as measured at a distance of 50 feet from the operating equipment.

Table 3.11-2: Typical Construction Equipment Maximum Noise Levels

Type of Equipment	Specification Maximum Sound Levels for Analysis (dBA at 50 feet)
Impact Pile Driver	95
Auger Drill Rig	85
Vibratory Pile Driver	95
Jackhammers	85
Pneumatic Tools	85
Pumps	77
Scrapers	85
Cranes	85

Type of Equipment	Specification Maximum Sound Levels for Analysis (dBA at 50 feet)
Portable Generators	82
Rollers	85
Bulldozers	85
Tractors	84
Front-End Loaders	80
Backhoe	80
Excavators	85
Graders	85
Air Compressors	80
Dump Truck	84
Concrete Mixer Truck	85
Pickup Truck	55
Source: Federal Highway Administration (FHWA). 2006. Highway Construction Noise Handbook. August.	

Noise from Multiple Sources

Because sound pressure levels in decibels are based on a logarithmic scale, they cannot be added or subtracted in the usual arithmetical way. Therefore, sound pressure levels in decibels are logarithmically added on an energy summation basis. In other words, adding a new noise source to an existing noise source, both producing noise at the same level, will not double the noise level. Instead, if the difference between two noise sources is 10 dBA or more, the louder noise source will dominate, and the resultant noise level will be equal to the noise level of the louder source. In general, if the difference between two noise sources is 0–1 dBA, the resultant noise level will be 3 dBA higher than the louder noise source, or both sources if they are equal. If the difference between two noise sources is 2–3 dBA, the resultant noise level will be 2 dBA above the louder noise source. If the difference between two noise sources is 4–10 dBA, the resultant noise level will be 1 dBA higher than the louder noise source.

Characteristics of Vibration

Groundborne vibration consists of rapidly fluctuating motion through a solid medium, specifically the ground, which has an average motion of zero and in which the motion’s amplitude can be described in terms of displacement, velocity, or acceleration. The effects of groundborne vibration typically only causes a nuisance to people, but in extreme cases, excessive groundborne vibration has the potential to cause structural damage to buildings. Although groundborne vibration can be felt outdoors, it is typically only an annoyance to people indoors where the associated effects of the shaking of a building are noticeable. Groundborne noise is an effect of groundborne vibration and only exists indoors, since it is produced from noise radiated from the motion of the walls and floors of a room and may also consist of the rattling of windows or dishes on shelves.

Several different methods are used to quantify vibration amplitude such as the maximum instantaneous peak in the vibrations velocity, which is known as the peak particle velocity (PPV) or the root mean square (rms) amplitude of the vibration velocity. Because of the typically small amplitudes of vibrations, vibration velocity is often expressed in decibels—denoted as LV—and is based on the reference quantity of 1 microinch per second. When assessing annoyance from groundborne vibration, vibration is typically expressed as rms velocity in units of decibels of 1 microinch per second, with the unit written in VdB. Typically, developed areas are continuously affected by vibration velocities of 50 VdB or lower. Human perception to vibration starts at levels as low as 67 VdB. Annoyance due to vibration in residential settings starts at approximately 70 VdB.

Off-site sources that may produce perceptible vibrations are usually caused by construction equipment, steel-wheeled trains, and traffic on rough roads, while smooth roads rarely produce perceptible groundborne noise or vibration. Construction activities, such as blasting, pile-driving, and operating heavy earthmoving equipment, are common sources of groundborne vibration. Construction vibration impacts on building structures are generally assessed in terms of PPV. Typical vibration source levels from construction equipment are shown in Table 3.11-3.

Table 3.11-3: Vibration Levels of Construction Equipment

Construction Equipment	PPV at 25 Feet (inches/second)	rms Velocity in Decibels (VdB) at 25 Feet
Water Trucks	0.001	57
Scraper	0.002	58
Bulldozer—small	0.003	58
Jackhammer	0.035	79
Concrete Mixer	0.046	81
Concrete Pump	0.046	81
Paver	0.046	81
Pickup Truck	0.046	81
Auger Drill Rig	0.051	82
Backhoe	0.051	82
Crane (Mobile)	0.051	82
Excavator	0.051	82
Grader	0.051	82
Loader	0.051	82
Loaded Trucks	0.076	86
Bulldozer—large	0.089	87
Caisson drilling	0.089	87
Vibratory Roller (small)	0.101	88
Compactor	0.138	90
Clam shovel drop	0.202	94

Construction Equipment	PPV at 25 Feet (inches/second)	rms Velocity in Decibels (VdB) at 25 Feet
Vibratory Roller (large)	0.210	94
Pile Driver (impact-typical)	0.644	104
Pile Driver (impact-upper range)	1.518	112
Notes: PPV = peak particle velocity rms = root mean square Source: Compilation of scientific and academic literature, generated by Federal Transit Administration (FTA) and Federal Highway Administration (FHWA).		

The propagation of groundborne vibration is not as simple to model as airborne noise. This is because noise in the air travels through a relatively uniform medium, while groundborne vibrations travel through the earth, which may contain significant geological differences. Factors that influence groundborne vibration include:

- **Vibration source:** Type of activity or equipment, such as impact or mobile, and depth of vibration source;
- **Vibration path:** Soil type, rock layers, soil layering, depth to water table, and frost depth; and
- **Vibration receiver:** Foundation type, building construction, and acoustical absorption.

Among these factors that influence groundborne vibration, there are significant differences in the vibration characteristics when the source is underground compared to at the ground surface. In addition, soil conditions are known to have a strong influence on the levels of groundborne vibration. Among the most important factors are the stiffness and internal damping of the soil and the depth to bedrock. Vibration propagation is more efficient in stiff clay soils than in loose sandy soils, and shallow rock seems to concentrate the vibration energy close to the surface and can result in groundborne vibration problems at large distance from the source. Factors such as layering of the soil and depth to the water table can have significant effects on the propagation of groundborne vibration. Soft, loose, sandy soils tend to attenuate more vibration energy than hard, rocky materials. Vibration propagation through groundwater is more efficient than through sandy soils. There are three main types of vibration propagation: surface, compression, and shear waves. Surface waves, or Rayleigh waves, travel along the ground’s surface. These waves carry most of their energy along an expanding circular wave front, similar to ripples produced by throwing a rock into a pool of water. P-waves, or compression waves, are body waves that carry their energy along an expanding spherical wave front. The particle motion in these waves is longitudinal (i.e., in a “push-pull” fashion). P-waves are analogous to airborne sound waves. S-waves, or shear waves, are also body waves that carry energy along an expanding spherical wave front. However, unlike P-waves, the particle motion is transverse, or side-to-side and perpendicular to the direction of propagation.

As vibration waves propagate from a source, the vibration energy decreases in a logarithmic nature and the vibration levels typically decrease by 6 VdB per doubling of the distance from the vibration source. As stated above, this drop-off rate can vary greatly depending on the soil type, but it has been shown

to be effective enough for screening purposes, to identify potential vibration impacts that may need to be studied through actual field tests.

Existing Noise Levels

Traffic Noise

Traffic noise depends primarily on traffic speed and the proportion of truck traffic. Existing traffic noise levels along selected roadway segments in the vicinity of the potential sites for housing were modeled using the FHWA Traffic Noise Prediction Model (FHWA-RD-77-108). Site-specific information is entered, such as roadway traffic volumes, roadway active width, source-to-receiver distances, travel speed, noise source and receiver heights, and the percentages of automobiles, medium trucks, and heavy trucks that the traffic is made up of throughout the day, among other variables. The modeled Average Daily Traffic (ADT) volumes were derived from the PM peak-hour traffic data provided by Fehr & Peers.¹ The model inputs and outputs, including the 60 dBA, 65 dBA, and 70 dBA L_{dn} traffic noise contour distances, are provided in Appendix F. A summary of the modeling results is shown in Table 3.11-4.

Table 3.11-4: Existing (Year 2022) Traffic Noise Levels

Roadway Segment	ADT	Centerline to 70 L_{dn} (feet)	Centerline to 65 L_{dn} (feet)	Centerline to 60 L_{dn} (feet)	L_{dn} (dBA) 50 feet from Centerline of Outermost Lane
Dublin Canyon Road–west of Foothill Road	11,400	< 50	50	108	64.3
Foothill Road–Dublin Canyon Road to Stoneridge Drive	22,400	164	349	751	75.5
Foothill Road–Las Positas Boulevard to Bernal Avenue	9,400	94	197	422	71.7
Hopyard Road–Owens Drive to Stoneridge Drive	23,900	173	365	784	75.0
Hacienda Drive–I-580 to Owens Drive	29,300	172	365	783	75.0
Hacienda Drive–Owens Drive to Stoneridge Drive	15,200	115	237	506	72.2
Old Santa Rita Road–Rosewood Drive to Santa Rita Road	1,200	< 50	< 50	< 50	54.0
Pimlico Drive–Santa Rita Road to Brockton Drive	9,000	< 50	< 50	73	61.1
Stoneridge Drive–Foothill Road to Stoneridge Mall Road	10,900	91	190	406	71.4
Stoneridge Drive–Hacienda Drive to Gibraltar Drive	15,800	114	242	519	73.1
Stoneridge Drive–Santa Rita Road to Kamp Drive	20,300	116	245	527	73.1

¹ Fehr & Peers. 2022. Pleasanton Housing Element–Transportation Assessment.

Roadway Segment	ADT	Centerline to 70 L _{dn} (feet)	Centerline to 65 L _{dn} (feet)	Centerline to 60 L _{dn} (feet)	L _{dn} (dBA) 50 feet from Centerline of Outermost Lane
Santa Rita Road–Stoneridge Drive to Valley Avenue	40,200	241	516	1,108	77.3
Valley Avenue–Greenwood Road to Santa Rita Road	16,900	103	217	466	72.3
Valley Avenue–Busch Road to Stanley Boulevard	20,300	134	286	613	74.1
Busch Road–east of Valley Avenue	2,300	< 50	< 50	< 50	55.9
First Street–Abbie Street to Bernal Avenue	16,500	69	147	316	70.7
Sunol Boulevard–Valley Avenue to Sycamore Road	17,900	124	263	564	73.6
Bernal Avenue–First Street to Hearst Drive	12,200	82	175	375	71.9
<p>Notes: ADT = Average Daily Traffic dBA = A-weighted decibel L_{dn} = day/night average sound level - Modeling results do not account for mitigating features such as topography, vegetative screening, fencing, building design, or structure screening. Rather, they assume a worst-case scenario of having a direct line of site on flat terrain. Source: FirstCarbon Solutions (FCS). 2022.</p>					

Highways I-580 and I-680 are also major existing traffic noise sources within the city. According to the Noise Element, Chapter 11, of the General Plan, existing traffic noise levels within the city limits adjacent to the segment of I-580 with the Bay Area Rapid Transit (BART) rail average 70 dBA L_{dn} at a distance of approximately 1,200 feet from the roadway centerline (assuming no reduction for shielding due to structures or soundwalls). Existing traffic noise levels near I-680 average 70 dBA L_{dn} at a distance of approximately 700 feet from the roadway centerline (assuming no reduction for shielding due to structures or soundwalls).

Railroad Noise

According to the Noise Element, Chapter 11, of the General Plan, current freight rail operations within the city limits average 11-13 trains throughout each 24-hour day, resulting in an average noise level of 60 dBA L_{dn} as measured at a distance of 190 feet from the center of the tracks along rail lines within the city limits.

Noise-sensitive Land Uses

Noise-sensitive land uses generally consist of those uses where exposure to noise would result in adverse effects, as well as uses for which quiet is an essential element of their intended purpose. Residential dwellings are of primary concern, because of the potential for increased and prolonged exposure of individuals to both interior and exterior noise levels. Other typical noise-sensitive land uses include hospitals, convalescent facilities, hotels, religious institutions, libraries, and other uses where low noise levels are essential.

3.11.3 - Regulatory Framework

Federal

Noise Control Act

The adverse impact of noise was officially recognized by the federal government in the Noise Control Act of 1972, which serves three purposes:

- Promulgating noise emission standards for interstate commerce
- Assisting state and local abatement efforts
- Promoting noise education and research

The Federal Office of Noise Abatement and Control (ONAC) was initially tasked with implementing the Noise Control Act. However, the ONAC has since been eliminated, leaving the development of federal noise policies and programs to other federal agencies and interagency committees.

Among the agencies now regulating noise are the Occupational Safety and Health Administration (OSHA), which limits noise exposure of workers to 90 dB L_{eq} or less for 8 continuous hours or 105 dB L_{eq} or less for 1 continuous hour; the United States Department of Transportation (USDOT), which assumed a significant role in noise control through its various operating agencies; and the Federal Aviation Administration (FAA), which regulates noise of aircraft and airports. Surface transportation system noise is regulated by a host of agencies, including the FTA. Transit noise is regulated by the federal Urban Mass Transit Administration, while freeways that are part of the interstate highway system are regulated by the FHWA. Finally, the federal government actively advocates that local jurisdictions employ their land use regulatory authority to arrange new development in such a way that “noise sensitive” uses are either prohibited from being sited adjacent to a highway, or, alternatively, that developments are planned and constructed in such a manner that minimize potential noise impacts.

Since the federal government has preempted the setting of standards for noise levels that can be emitted by transportation sources, local jurisdictions are limited to regulating the noise generated by the transportation system through nuisance abatement ordinances and land use planning.

Federal Transit Administration Standards and Guidelines

The FTA has established industry-accepted standards for vibration impact criteria and impact assessment. These guidelines are published in its Transit Noise and Vibration Impact Assessment document.² The FTA guidelines include thresholds for construction vibration impacts for various structural categories as shown in Table 3.11-5.

Table 3.11-5: Federal Transit Administration Construction Vibration Impact Criteria

Building Category	PPV (in/sec)	Approximate VdB
I. Reinforced Concrete, Steel or Timber (no plaster)	0.5	102
II. Engineered Concrete and Masonry (no plaster)	0.3	98

² Federal Transit Administration (FTA). 2006. Transit Noise and Vibration Impact Assessment: FTA-VA-90-1003-06. May.

Building Category	PPV (in/sec)	Approximate VdB
III. Non-engineered Timber and Masonry Buildings	0.2	94
IV. Buildings Extremely Susceptible to Vibration Damage	0.12	90
Source: Federal Transit Administration (FTA). 2006. Transit Noise and Vibration Impact Assessment: FTA-VA-90-1003-06. May		

State

California General Plan Guidelines

Established in 1973, the California Department of Health Services Office of Noise Control was instrumental in developing regularity tools to control and abate noise for use by local agencies. One significant model is the “Land Use Compatibility for Community Noise Environments Matrix,” which allows local jurisdictions to delineate compatibility of sensitive uses with various incremental levels of noise.³

Government Code Section 65302 mandates that the legislative body of each county and city in California adopt a noise element as part of its comprehensive general plan. The local noise element must recognize the land use compatibility guidelines published by the State Department of Health Services. The guidelines rank noise/land use compatibility in terms of normally acceptable, conditionally acceptable, normally unacceptable, and clearly unacceptable.

California Building Standards Code

California has established noise insulation standards for new hotels, motels, apartment houses, and dwellings (other than single-family detached housing). These requirements are provided in the California Building Standards Code (CBC) (California Code of Regulations [CCR] Title 24).⁴ The 2022 CBC was published on July 1, 2022, with an effective date of January 1, 2023. As provided in the CBC, the noise insulation standards set forth an interior standard of 45 dBA CNEL as measured from within a structure’s interior. When such structures are located within a 65-dBA CNEL (or greater) exterior noise contour associated with a traffic noise along a roadway, an acoustical analysis is required to ensure that interior levels do not exceed the 45-dBA CNEL threshold. Title 24 standards are typically enforced by local jurisdictions through the building permit application process.

Local

City of Pleasanton

City of Pleasanton General Plan

The City amended the General Plan Noise Element in 2013. The City’s established noise and land use compatibility guidelines are shown in Table 3.11-6.

³ California Department of Health Services Office of Noise Control. 1976. Land Use Compatibility for Community Noise Environments Matrix.

⁴ California Building Standards Commission. 2019. California Building Standards Code (CCR Title 24), January 1.

Table 3.11-6 Noise and Land Use Compatibility Guidelines

Land Use Category	Exterior Noise Exposure (L _{dn}), dB					
	55	60	65 ²	70	75	80
Single-Family Residential ¹	Normally Acceptable		Conditionally Acceptable			Unacceptable
Multi-Family Residential, Hotels, and Motels ¹	Normally Acceptable		Conditionally Acceptable		Unacceptable	
Outdoor Sports and Recreation, Neighborhood Parks and Playgrounds	Normally Acceptable		Conditionally Acceptable			Unacceptable
Schools, Libraries, Museums, Hospitals, Personal Care, Meeting Halls, Churches	Normally Acceptable		Conditionally Acceptable			Unacceptable
Office Buildings, Business, Commercial, and Professional	Normally Acceptable			Conditionally Acceptable		Unacceptable
Auditoriums, Concert Halls, Amphitheaters	Conditionally Acceptable			Unacceptable		
	Normally Acceptable: Specified land use is satisfactory, based upon the assumption that any buildings involved are of normal conventional construction, without any special insulation requirements.					
	Conditionally Acceptable: Specified land use may be permitted only after detailed analysis of the noise reduction requirements and needed noise insulation features included in the design.					
	Unacceptable: New construction or development should generally not be undertaken because mitigation is usually not feasible to comply with noise element policies.					
<p>Notes:</p> <p>dBA = A-weighted decibel</p> <p>L_{dn} = day/night average sound level</p> <p>¹ In noise environments resulting primarily from railroad trains, exterior noise levels up to 70 dBA L_{dn} are normally acceptable recognizing that day-night average noise levels are controlled by intermittent, loud events.</p> <p>² <65 dBA outdoors = < 45 dBA indoors</p> <p>Source: City of Pleasanton. 2005. Pleasanton Plan 2025. Noise Element. Table 11-5.</p>						

The Noise Element also sets forth the following policies to protect the health and welfare of the community that are directly applicable to the Housing Element Update.⁵

Goal 1 Reduce noise to acceptable levels throughout the community.

Policy 1 Require new projects to meet acceptable exterior noise level standards.

Program 1.1 Use the normally acceptable designation and text description contained in Table 11-5 “Noise and Land- Use Compatibility Guidelines,” to determine the acceptability of new development and to determine when noise studies are required. For new single-family residential development, maintain a maximum day/night average noise level standard of 60 dBA L_{dn} for exterior noise in private or shared outdoor use areas excluding front yards. For new multi-family residential development, maintain a maximum standard of 65 dBA L_{dn} in community outdoor recreation areas (or 60 dBA L_{dn} when the outdoor noise is due to aircraft). Noise standards are not applied to balconies or front yards. In the Downtown, the City Council will evaluate the requirement to achieve these standards on a case-by-case basis.

Program 1.2 Where high noise levels are the result of railroad trains, an exterior noise level of up to 70 dBA L_{dn} would be considered compatible with most residential development recognizing that day-night average noise levels are controlled by intermittent, loud events. Vibration-sensitive land uses located near the Union Pacific Railroad tracks should demonstrate compatibility with the Federal Transit Administration’s vibration impact criteria by completing site-specific vibration analyses.

Program 1.3 Use noise guidelines and contours to determine the need for noise studies and require new developments to construct or pay for noise attenuation features as a condition of approving new projects. An exterior increase of more than 4 decibels is considered significant.

Program 1.4 Require noise studies for future projects to use a consistent format, to include a description of the methodology and assumptions used, to analyze alternative noise mitigation measures, and to evaluate the effectiveness of the mitigation following implementation.

Program 1.5 Encourage the use of setbacks, landscaped earth berms, and frontage roads where feasible to reduce exterior noise levels. The use of soundwalls should only be used where other mitigation measures are not feasible. Where sound and frontage roads walls are needed, design and high-quality materials, as well as landscaping, should be used to mitigate their visual impact.

Program 1.6 Require a vibration study, prepared by a qualified vibration consultant, with a site-specific engineering assessment for any proposed construction project that would

⁵ City of Pleasanton General Plan. 2013. Noise Element. Website:
<https://www.cityofpleasantonca.gov/gov/depts/cd/planning/general.asp>. Accessed April 22, 2022.

require pile-driving or similar vibration causing impacts. The assessment would minimize potential vibration impacts through such measures as pre-drilling pile hoses, driving piles hydraulically or enclosing sheet piles with rubber aprons. The City Engineer would review and approve all vibration studies.

- Policy 3** Ensure that noise does not exceed interior noise levels of 45 dBA L_{dn} for residential uses and those levels specified in noise studies for other uses.
- Program 3.1** Require new developments to pay their fair share of mitigation measures necessary to reduce interior noise levels within existing adjacent or impacted land uses.
- Program 3.2** Require noise attenuation measures when necessary to ensure that interior noise levels for new single- and multi-family residences do not exceed 45 dBA L_{dn} . Interior noise levels shall not exceed 45 dBA L_{dn} in any new residential units (single and multi-family). Development sites exposed to noise levels exceeding 60 dBA L_{dn} shall be analyzed following protocols in Appendix Chapter 12, Section 1208, A, Sound Transmission Control, 2001 (current) California Building Code, Section 1207.
- Program 3.3** New residential development affected by noise from railroad trains and aircraft shall be designed to limit typical maximum instantaneous noise levels to 50 dBA in bedrooms and 55 dBA in other rooms.
- Program 3.4** Appropriate interior noise levels in commercial, industrial, and office buildings are a function of the use of the space. Interior noise levels in noise-sensitive spaces (e.g., offices) generally should be maintained at 45 dBA L_{eq} or less (hourly average).
- Policy 4** Control noise at its source to maintain existing noise levels, and in no case to exceed acceptable noise levels as established in the Noise and Land Use Compatibility Guidelines, Table 11-5 (Table 3.11-6 in this Program EIR, above).
- Program 4.1** Enforce the noise emission standards for various noise-emitting land uses established in the City's Noise Ordinance.
- Program 4.2** Develop a mechanical drive engine ordinance that would establish noise limits for engines, such as electricity generators, used in commercial and industrial operations.
- Program 4.3** Aggressively enforce the noise emissions standards for all vehicles. Enforce Section 27007 of the California Motor Vehicle Code. This section prohibits amplified sound which can be heard 50 or more feet from a vehicle. Control excessive exhaust noise by enforcing Section 27150 of the *California Motor Vehicle Code*.
- Program 4.4** Explore opportunities to reduce noise-impacted areas through alternative street paving methods and materials.

- Program 4.5** Rebuild or build sound berms or walls as Capital Improvement Projects of the City to provide improved sound mitigation for existing neighborhoods impacted by unacceptable noise.
- Program 4.6** Require developers of new projects that would significantly increase noise in nearby homes to mitigate noise impacts with walls, berms or other measures, and/or to provide noise-attenuating measures in the homes.
- Policy 5** Protect schools, hospitals, libraries, religious facilities, convalescent homes, and other noise-sensitive uses from noise levels exceeding those allowed in residential areas.
- Program 5.1** Locate new noise-sensitive land uses away from noise sources unless development plans include appropriate mitigation measures.
- Program 5.2** Locate new noise sources away from noise-sensitive land uses unless development plans include appropriate mitigation measures.
- Policy 6** Limit truck traffic in residential and commercial areas to designated truck routes, as consistent with State law.
- Program 6.1** Limit construction, delivery, and through-truck traffic to designated routes.
- Program 6.2** Enforce the use of truck routes.
- Policy 7** Design City streets to reduce noise levels in adjacent areas.
- Program 7.1** As appropriate, require sound-attenuating paving on streets, earth berms, setbacks, sound walls, and/or other noise reduction techniques as conditions of development approval. Developers should use sound walls only where other techniques are not feasible. Where sound walls are needed, design and high-quality materials, as well as landscaping, should be used to mitigate their visual impact.
- Program 7.2** Attempt to maintain collector streets at 6,000-10,000 or fewer Average Daily Traffic (ADT) to ensure acceptable noise levels within adjacent residences.

Vineyard Avenue Corridor Specific Plan

The following are mitigation requirements for noise and vibration for development that occurs within the Vineyard Corridor Specific Plan area.

- All new two-story homes constructed less than 140 feet from the centerline of the realigned Vineyard Avenue and all new homes located where projected noise levels exceed an L_{dn} of 55 dBA (Lots 8, 9, 13, 15, 18, 19, 20, 21, 26, 27, and 28) shall be constructed with a fresh-air ventilation and/or air conditioning system that allows residents to maintain closed windows for noise and dust control. All windows facing the RMC Lonestar plant shall be dual-paned.

Other mitigation measures (i.e., berms, landscaping, and siting strategies) may also be necessary depending upon the location of homes.

- New homes located on lots where projected noise levels exceed an L_{dn} of 60 dBA (Lots 8, 9, 13, 15, 18, 19, 20, 21, 26, 27, and 28) should be designed to locate sensitive outdoor recreation areas on the south side of homes (opposite the RMC Lonestar quarry operations and the realigned Vineyard Avenue), wherever possible.
- The recorded deed of sale for all lots shall include a clause which states that the property is in an area subject to excessive noise, dust, and vibration levels from gravel harvesting and processing and that the City of Pleasanton is not liable for possible damages due to such impacts.
- All lots within the Specific Plan Area shall also include a noise/dust/vibration easement in the recorded deed of sale. In addition, a separate disclosure statement shall be provided to prospective purchasers and tenants by lot owners, developers, and future successors in interest. The disclosure statement shall provide full disclosure of the potential future mining operations within the Specific Plan Area.
- The recorded deed of sale for all future lots shall include a disclosure statement indicating the close proximity of the Plan Area to the Livermore Municipal Airport and of possible impacts due to aircraft overflights.

Hacienda Planned Unit Development Plan Design Guidelines

The Hacienda Planned Unit Development (PUD) Plan Design Guidelines do not contain regulations relevant to noise.

Pleasanton Municipal Code

The City has established operational noise performance standards for residential properties in Section 9.04.030 of the Municipal Code which prohibits noise levels in excess of 60 dBA at any point outside the property plan, unless otherwise provided in the Municipal Code. For example, Section 9.04.070 provides a daytime exception that any noise which does not produce a noise level exceeding 70 dBA at a distance of 25 feet under its most noisy condition of use shall be exempt from the provisions of Sections 9.04.030 between the hours of 8:00 a.m. and 8:00 p.m. daily, except Sundays and holidays, when the exemption herein shall apply between 10:00 a.m. and 6:00 p.m.

Section 9.04.100 establishes the City's restrictions on construction noise. Construction noise is exempt from the noise performance standards of the Noise Ordinance between the hours of 8:00 a.m. and 8:00 p.m. daily, except Sunday and holidays, when the exemption shall apply between 10:00 a.m. and 6:00 p.m., provided the construction activity meets at least one of the following noise limitations:

- A. No individual piece of equipment shall produce a noise level exceeding 83 dBA at a distance of 25 feet. If the device is housed within a structure on the property, the measurement shall be made outside the structure at a distance as close to 25 feet from the equipment as possible; or

- B. The noise level at any point outside of the property plane of the project shall not exceed 86 dBA. See Section 9.04.100.

According to Section 9.04.110, an exception permit may be granted to allow exemption from noise performance standards of the Noise Ordinance. Such a permit shall be of as short duration as possible (up to a six months), but is renewable upon a showing of good cause, and shall be conditioned by a schedule and details of methods for compliance in appropriate cases.

3.11.4 - Project Impacts and Mitigation Measures

Significance Criteria

The City is using Appendix G of the State California Environmental Quality Act (CEQA) Guidelines as thresholds of significance for the Housing Element Update. To determine whether impacts related to noise are significant environmental effects, the following questions are analyzed and evaluated.

Would the Housing Element Update:

- a) Expose persons to or generation of noise levels in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies?
- b) Expose persons to or generation of excessive groundborne vibration or groundborne noise levels?
- c) For a project located within the vicinity of a private airstrip or an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, expose people residing or working in the project area to excessive noise levels?

Approach to Analysis

Construction Noise Analysis Methodology

Construction noise impacts are analyzed at a programmatic level. A reasonable worst-case scenario was analyzed assuming each piece of modeled equipment would operate simultaneously on an individual development site. Noise emission levels recommended by FHWA's Highway Construction Noise Handbook were used to ascertain the noise generated by specific types of construction equipment. The construction noise impact was evaluated in terms of maximum levels (L_{max}). Analysis requirements were based on the sensitivity of nearby receptors and compliance with the City's construction noise requirements in Section 9.04.100 of the Noise Ordinance.

Traffic Noise Modeling Methodology

Traffic noise impacts are analyzed at a programmatic level. The FHWA highway traffic noise prediction model (FHWA-RD-77-108) was used to evaluate traffic-related noise conditions in the vicinity of the potential sites for housing. The modeled ADT volumes were derived from the PM peak-hour traffic data provided by Fehr & Peers. The PM peak-hour volumes are, on average, higher than the AM peak-hour volumes. The resultant noise levels were weighted and summed over a 24-hour period in order to determine the L_{dn} values. The traffic noise modeling input and output files—including the 60 dBA, 65 dBA, and 70 dBA L_{dn} noise contour distances—are included in Appendix F.

The FHWA-RD-77-108 Model arrives at a predicted noise level through a series of adjustments to the reference energy mean emission level. Adjustments are then made to the reference energy mean emission level to account for the roadway active width (i.e., the distance between the center of the outermost travel lanes on each side of the roadway); the total ADT; the percentage of ADT that flows during the day, evening, and night; the travel speed; the vehicle mix on the roadway; a percentage of the volume of automobiles, medium trucks, and heavy trucks; the roadway grade; the angle of view of the observer exposed to the roadway; and the site conditions (“hard” or “soft”) as they relate to the absorption of the ground, pavement, or landscaping. The identified roadway segments were chosen to be modeled since they are the segments that would carry the highest percentages of the traffic volumes in the vicinity of the potential sites for housing. Roadway segments identified in the traffic analysis as arterials were modeled using established vehicle distribution percentages for arterial or expressway roadways. All other roadway segments were modeled using default surface street vehicle distribution percentages.

The level of traffic noise depends on the three primary factors: (1) the volume of the traffic, (2) the speed of the traffic, and (3) the number of trucks in the flow of traffic. Generally, the loudness of traffic noise is increased by heavier traffic volumes, higher speeds, and greater number of trucks. Vehicle noise is a combination of the noise produced by the engine, exhaust, and tires.

The model calculated traffic noise levels under without-project conditions and levels that would occur under project-generated traffic conditions. The traffic noise levels were calculated based on a single-lane-equivalent noise source combining both directions of travel. A single-lane-equivalent noise source is when the vehicular traffic from all lanes is combined into a theoretical single-lane that has a width equal to the distance between the two outside lanes of a roadway, which provides almost identical results to analyzing each lane separately where elevation changes are minimal. The modeling assumes a direct line of sight to the roadway and flat terrain conditions. Impacts are determined based on whether development consistent with the Housing Element Update would result a substantial permanent increase, identified by the General Plan as an increase of greater than 4 dBA compared to levels that would exist without development consistent with the Housing Element Update.

Stationary Noise Source Analysis Methodology

Stationary source noise impacts are analyzed at a programmatic level. The Housing Element Update would generate noise from future development that could contain new exterior mechanical equipment sources, such as mechanical ventilation systems. To provide a conservative analysis, the highest end of the range of reference noise levels for these stationary noise sources was used to calculate the reasonable worst-case hourly average noise levels. These noise levels were then compared to the City’s applicable noise performance threshold to determine whether these noise sources would result in a substantial increase in excess of this standard.

Vibration Impact Analysis Methodology

Groundborne vibration impacts are analyzed at a programmatic level. Reasonable worst-case construction vibration levels are identified based on reference vibration levels for construction equipment identified in Table 3.11-3. The potential for future development of the potential sites for

housing resulting in permanent operational groundborne vibration impacts is also identified. The applicable General Plan policies are applied to the analysis and any potential impacts are identified.

Impact Evaluation

Substantial Noise Increase in Excess of Standards

Impact NOI-1: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments could generate a substantial temporary or permanent increase in ambient noise levels in the vicinity of the potential sites for housing in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies.

Short-term Construction Impacts

A significant impact would occur if project-related, noise producing construction activities exceed the City's established noise performance standards for construction activities. According to Section 9.04.100 of the Municipal Code, construction noise is exempt from the noise performance standards of the Noise Ordinance between the hours of 8:00 a.m. and 8:00 p.m. daily, except Sunday and holidays, when the exemption shall apply between 10:00 a.m. and 6:00 p.m., provided the construction activity meets at least one of the following noise limitations:

- A. No individual piece of equipment shall produce a noise level exceeding 83 dBA at a distance of 25 feet. If the device is housed within a structure on the property, the measurement shall be made outside the structure at a distance as close to 25 feet from the equipment as possible; or
- B. The noise level at any point outside of the property plane of the project shall not exceed 86 dBA.

Development that could occur from implementation of the Housing Element Update is expected to result in construction activities in the vicinity of the potential sites for housing. Because Sites 1 (Lester) and 22 (Merritt) would be annexed into the city prior to development, potential noise impacts for those sites were evaluated against the City's thresholds. Noise impacts from construction activities would be a function of the noise generated by construction equipment, equipment location, sensitivity of nearby land uses, and the timing and duration of the construction activities.

For future development projects, two types of short-term noise impacts would occur during site preparation and project construction. The first type would result from the increase in traffic flow on local streets, associated with the transport of workers, equipment, and materials to and from the project site. The transport of workers and construction equipment and materials to a development site would incrementally increase noise levels on access roads leading to a site. Typically, a doubling of the ADT hourly volumes on a roadway segment is required to result in an increase of 3 dBA in traffic noise levels, which, as discussed in the characteristics of noise discussion above, is the lowest change perceptible to the human ear in outdoor environments. Based on existing traffic volumes on roadway segments adjacent to each potential site for housing, any future individual development project's construction trips would not be expected to double the hourly or daily traffic volumes along roadway segments in the vicinity of a development site. For this reason, short-term

intermittent noise from construction trips would not be expected to result in a perceptible increase in hourly or daily average traffic noise levels. Therefore, short-term construction-related noise impacts associated with the transportation of workers and equipment to a development site would be less than significant.

For future development projects, the second type of short-term noise impact is related to noise generated during site preparation, grading, and construction activities. Construction is performed in discrete steps, each of which has its own mix of equipment, and consequently, its own noise characteristics. These various sequential phases would change the character of the noise generated on-site. Thus, the noise levels vary as construction progresses. Despite the variety in the types and sizes of construction equipment, similarities in the dominant noise sources and patterns of operation allow construction noise ranges to be categorized by work phase. Table 3.11-2 shows typical noise levels of construction equipment as measured at a distance of 50 feet from the operating equipment.

The site preparation phase of a future project, which includes excavation and grading activities, generates the highest noise levels because the noisiest construction equipment is earthmoving equipment. Earthmoving equipment includes excavating machinery and compacting equipment, such as bulldozers, draglines, backhoes, front loaders, roller compactors, scrapers, and graders. Typical operating cycles for these types of construction equipment may involve 1 or 2 minutes of full power operation followed by 3 or 4 minutes at lower power settings.

The Housing Element Update does not propose or confer any specific development projects; however, development projects consistent with the Housing Element Update would be expected to require the use of some of the loudest pieces of construction equipment listed in Table 3.11-2. For example, the maximum noise level generated by each scraper is assumed to be 85 dBA L_{max} at 50 feet from this equipment. Bulldozers would generate 85 dBA L_{max} at 50 feet. The maximum noise level generated by graders is approximately 85 dBA L_{max} at 50 feet. Each doubling of sound sources with equal strength increases the noise level by 3 dBA. Assuming that each piece of construction equipment operates at some distance from the other equipment, a reasonable worst-case combined noise level during this phase of construction would be 90 dBA L_{max} at a distance of 50 feet from the acoustical center of a construction area. This would result in a reasonable worst-case hourly average of 86 dBA L_{eq} . The acoustical center reference is used because construction equipment must operate at some distance from one another on a project site, and the combined noise level as measured at a point equidistant from multiple sources operating simultaneously would represent the worst-case noise levels.

Construction noise within the City is restricted by the Municipal Code in intensity and hours of operation. Because the potential sites for housing would be developed within the city limits, they would be required to meet the requirements of the Municipal Code. In addition, the City has a code enforcement system that would handle construction noise complaints. Enforcement of the restricted hours of construction and the limit on the permissible maximum noise levels as measured at a project site property plane would reduce potential construction noise impacts to not result in a substantial temporary increase in ambient noise levels and would especially preclude potential impacts during evening and nighttime hours. This analysis assumes that all future development

projects on the potential sites for housing would follow requirements of the Municipal Code. Individual housing development projects would be reviewed and approved as required by the procedures of the Municipal Code and as outlined in Chapter 2, Project Description, may require additional CEQA review, as appropriate. Therefore, on a program level, future development of the potential sites for housing would result in less than significant construction noise impacts.

Traffic Noise Impacts

A significant impact would occur if project-generated traffic would result in a substantial increase in ambient noise levels compared with those that would exist without implementation of the Housing Element Update. The General Plan states that “an exterior increase of more than 4 decibels is considered significant.”

Table 3.11-7 shows a summary of the traffic noise levels for projected traffic conditions without and with the Housing Element Update, as measured at 50 feet from the centerline of the outermost travel lane.

Table 3.11-7: Traffic Noise Levels Without and With Development Consistent with the Housing Element Update

Roadway Segment	L _{dn} (dBA) 50 feet from Centerline of Outermost Lane					
	Existing no Project	Existing plus Project (dBA)	Increase over Existing no Project (dBA)	Cumulative no Project	Cumulative plus Project	Increase over Cumulative no Project (dBA)
Dublin Canyon Road–west of Foothill Road	64.3	64.5	0.2	64.7	64.9	0.2
Foothill Road–Dublin Canyon Road to Stoneridge Drive	75.5	75.9	0.4	76.7	76.9	0.2
Foothill Road–Las Positas Boulevard to Bernal Avenue	71.7	72.1	0.4	72.5	72.8	0.3
Hopyard Road–Owens Drive to Stoneridge Drive	75.0	75.8	0.8	76.6	76.8	0.2
Hacienda Drive–I-580 to Owens Drive	75.0	75.2	0.2	77.1	77.3	0.2
Hacienda Drive–Owens Drive to Stoneridge Drive	72.2	72.5	0.3	73.8	74.1	0.3
Old Santa Rita Road–Rosewood Drive to Santa Rita Road	54.0	55.2	1.2	55.5	56.4	0.9
Pimlico Drive–Santa Rita Road to Brockton Drive	61.1	61.7	0.6	61.8	62.0	0.2
Stoneridge Drive–Foothill Road to Stoneridge Mall Road	71.4	71.6	0.2	72.8	72.9	0.1
Stoneridge Drive–Hacienda Drive to Gibraltar Drive	73.1	73.6	0.5	75.3	75.6	0.3

Roadway Segment	L _{dn} (dBA) 50 feet from Centerline of Outermost Lane					
	Existing no Project	Existing plus Project (dBA)	Increase over Existing no Project (dBA)	Cumulative no Project	Cumulative plus Project	Increase over Cumulative no Project (dBA)
Stoneridge Drive–Santa Rita Road to Kamp Drive	73.1	73.4	0.3	73.4	73.8	0.4
Santa Rita Road–Stoneridge Drive to Valley Avenue	77.3	77.6	0.3	78.0	78.2	0.2
Valley Avenue–Greenwood Road to Santa Rita Road	72.3	72.6	0.3	73.1	73.5	0.4
Valley Avenue–Busch Road to Stanley Boulevard	74.1	74.4	0.3	74.4	74.6	0.2
Busch Road–east of Valley Avenue	55.9	59.9	4.0	64.2	64.7	0.5
First Street–Abbie Street to Bernal Avenue	70.7	71.1	0.4	71.4	71.7	0.3
Sunol Boulevard–Valley Avenue to Sycamore Road	73.6	74.4	0.8	75.5	76.0	0.5
Bernal Avenue–First Street to Hearst Drive	71.9	72.3	0.4	73.5	73.7	0.2

Notes:
dBA = A-weighted decibel
L_{dn} = day/night average noise level
- Modeling results do not take into account mitigating features such as topography, vegetative screening, fencing, building design, or structure screening. Rather, they assume a worst-case scenario of having a direct line of site on flat terrain.
Source: FirstCarbon Solutions (FCS) 2022.

As is shown in Table 3.11-7, no modeled roadway segment would experience an increase in traffic noise levels of greater than 4 dBA compared to noise levels that would exist without implementation of the Housing Element Update under existing plus project and cumulative plus project scenarios. Only one roadway segment, Busch Road east of Valley Avenue, would experience an increase of up to 4 dBA under existing plus project conditions compared to conditions without the project. However, under cumulative conditions, the project-related increase on this segment would only be 0.5 dBA compared to cumulative conditions without implementation of the Housing Element Update. In addition, this increase would only result in noise levels of up to 59.9 dBA L_{dn} under existing plus project conditions, which is considered normally acceptable for new residential land use according to the City’s noise and land use compatibility guidelines. Moreover, as noted in Table 3.11-7, noise levels were modeled utilizing worst-case factors such as assuming flat, reflective terrain without any attenuating topography, vegetation, or building design. Therefore, buildout of the potential sites for housing would not result in a substantial permanent increase in traffic noise levels compared to levels that would exist without implementation of the Housing Element Update, and the impact would be less than significant.

Compliance with Applicable Plans, Policies, or Regulations

It should also be noted for informational purposes, development on potential sites for housing could expose new noise-sensitive uses to traffic or railroad noise levels in excess of the City's established normally acceptable noise land use compatibility standards shown in Table 3.11-6. However, implementation of the guidelines for land use compatibility contained in the General Plan will be used by the City to determine where new development would be allowed and where noise studies and mitigation measures are needed. For example, General Plan Noise Element Program 1.3 requires the use of noise guidelines and contours to determine the need for noise studies and also requires new developments to construct or pay for noise attenuation features as a condition of approving new projects. Program 1.5 of the Noise Element encourages the use of design strategies and other methods to attenuate noise in lieu of traditional sound walls. Program 4.3 of the Noise Element would enforce the noise emissions standards for all vehicles, and Program 4.4 establishes the City's policy of using noise-attenuating street paving in areas impacted by traffic noise.

Therefore, development consistent with the Housing Element Update that would include single- or multi-family land use development adjacent to roadway segments identified in Table 3.11-7 that have modeled noise levels in excess of 60 dBA or 65 dBA L_{dn} , respectively, as measured at 50 feet from the centerline of the outermost travel lane, shall demonstrate compliance with General Plan Noise Element Policy 1, 2, and 3 and incorporate project design features that would reduce traffic noise impacts for proposed development on that project site. In addition, any residential development on Site 27 (PUSD-Vineyard) must also comply with the measures included Vineyard Avenue Corridor Specific Plan, including the requirement for all new two-story homes constructed less than 140 feet from the centerline of the realigned Vineyard Avenue and all new homes located where projected noise levels exceed an L_{dn} of 55 dBA be constructed with a fresh-air ventilation and/or air conditioning system that allows residents to maintain closed windows for noise and dust control. Other measures (i.e., berms, landscaping, and siting strategies) may also be necessary depending upon the location of homes.

Stationary Operational Noise Impacts

A significant impact would occur if operational noise levels generated by stationary noise sources at development projects on the potential sites for housing would result in a substantial permanent increase in ambient noise levels in excess of the City's noise standards.

The City has established operational noise performance standards for residential properties in Section 9.04.030 of the Municipal Code which prohibits noise levels in excess of 60 dBA at any point outside the property plane unless otherwise provided in the Municipal Code.

The primary stationary noise source associated with development consistent with the Housing Element Update would be new mechanical ventilation system equipment operations. The potential associated impacts are discussed below.

Mechanical Equipment Operations

At the time of preparation of this analysis, details were not available pertaining to proposed mechanical ventilation systems for future development projects. Therefore, a reference noise level for typical mechanical ventilation systems was used for this analysis. Noise levels from typical

residential mechanical ventilation equipment are anticipated to range up to approximately 60 dBA L_{eq} at a distance of 25 feet.

These stationary source operational noise levels could exceed the City's threshold of 60 dBA as measured at a project property plane if they were to occur at a location closer than 25 feet from the project boundary.

Program 4.6 of the Noise Element requires developers of new projects that would significantly increase noise in nearby homes to mitigate noise impacts with walls, berms, or other measures and/or to provide noise-attenuating measures in the homes. Program 5.2 of the Noise Element requires developers of new projects to locate new noise sources away from noise-sensitive land uses unless development plans include appropriate mitigation measures.

These programs would help ensure that stationary source noise impacts would be reduced to the extent feasible. However, to ensure compliance with these programs and the City's noise performance standards, Mitigation Measure (MM) NOI-1 shall be implemented which requires preparation of a noise analysis for any development that would locate noise producing mechanical systems within 25 feet of a project property line. If potential noise impacts are identified, then mitigation must also be identified.

Therefore, compliance with the Noise Element Programs 4.6 and 5.2 and implementation of MM NOI-1, which require preparation of a noise study to identify appropriate design measures to reduce the potential effect of mechanical system operational noise, would ensure that stationary source noise impacts generated by future development projects on the potential sites for housing would be reduced to less than significant.

Level of Significance Before Mitigation

Potentially significant impact.

Mitigation Measures

MM NOI-1 Stationary Source Noise Impact Reduction Measure

Prior to issuance for entitlements for a project, for any development project on potential sites for housing that would include any noise producing mechanical systems located within 25 feet of a property line, the project applicant shall retain a Noise Specialist to conduct a site-specific project level noise analysis to evaluate compliance with Section 9.04.030 of the Municipal Code, which prohibits noise levels in excess of 60 A-weighted decibel (dBA) at any point outside the property plane. If the analysis identifies that proposed mechanical system operations could result in an exceedance of the City's noise performance standards, then specific measures to attenuate the noise impact shall be outlined in the analysis. The analysis shall be submitted to the City's Building and Safety Division for review and approval prior to issuance of building permits. The final noise-reduction measures shall be included on all final construction and building documents and/or construction management plans and submitted for verification to the City. Specific

measures may include, but are not limited to, the following measures or design features:

- The project applicant shall utilize quieter mechanical systems that would not result in an exceedance of the City's operational noise standards.
- The project applicant shall enclose mechanical systems in a sound-attenuating structure or shall install sound barriers adjacent to the proposed system that would reduce operational noise levels to not exceed the City's noise performance standards as measured at the property line.
- The project application shall relocate the proposed mechanical system further from property line to reduce operational noise levels to not exceed the City's noise performance standards as measured at the property line.

Level of Significance After Mitigation

Less than significant impact with mitigation incorporated.

Groundborne Vibration/Noise Levels

Impact NOI-2: Development consistent with the Housing Element Update, rezonings, and General and Specific Plan Amendments could result in generation of excessive groundborne vibration or groundborne noise levels.

This section analyzes both construction and operational groundborne vibration impacts. The City addresses vibration in Program 1.6 of the Noise Element. The program requires that a vibration study be prepared by a qualified vibration consultant with a site-specific engineering assessment for any proposed construction project that would require pile-driving or similar vibration causing impacts. However, the City has not adopted specific thresholds for groundborne vibration impacts; therefore, for purposes of this analysis, the FTA's vibration impact criteria are utilized to analyze vibration impacts. The FTA has established industry-accepted standards for vibration impact criteria and impact assessment. These guidelines are published in its Transit Noise and Vibration Impact Assessment Manual.

Short-term Construction Vibration Impacts to Off-site Receptors

Construction activity can result in varying degrees of ground vibration, depending on the equipment used on the site. Operation of construction equipment causes ground vibrations that spread through the ground and diminish in strength with distance. Buildings in the vicinity of a construction site respond to these vibrations with varying results, ranging from no perceptible effects at the low levels to slight damage at the highest levels. Table 3.11-3 provides approximate vibration levels for specific types of construction equipment and activities.

Future construction activities that could occur with development of the potential sites for housing would generate groundborne vibration. Groundborne vibration from construction activities has the potential to impact existing or future buildings (i.e., through structural damage) and their occupants (i.e., through activity disruption, annoyance, etc.) if they are located close enough to the construction sites. In general, vibration-induced structural damage could only occur when certain types of construction activity (e.g., blasting and pile-driving) take place close to existing structures,

while vibration-induced disruption/annoyance could occur during more common types of construction activity (e.g., truck movements) at greater distance from the activity area.

Of the variety of equipment used during construction, impact pile drivers that could be used in the site preparation phase of construction would produce the greatest groundborne vibration levels. Impact pile drivers produce groundborne vibration levels ranging up to 0.644 inch per second (in/sec) PPV at 25 feet from the operating equipment.

These potential construction vibration levels from future development projects could exceed the FTA's damage threshold criteria shown in Table 3.11-5. For example, the threshold criteria for structures of non-engineered timber and masonry construction is 0.2 in/sec PPV. Therefore, mitigation would be required to reduce this potential impact. Construction vibration sources can be mitigated to acceptable levels either at the source or on the adjacent property by using alternate equipment, employing adequate setbacks, or digging temporary trenches between the source and the receptor. For example, at a distance of 200 feet, vibration levels from an impact pile driver would attenuate to 0.02 in/sec PPV.

Therefore, in compliance with Program 1.6 of the Noise Element, implementation of MM NOI-2, which requires preparation of a Construction Vibration Reduction Plan, would ensure that vibration level impacts generated by future development projects would be reduced to a less than significant impact.

Operational Vibration Impacts

Development consistent with the Housing Element Update would involve residential and commercial land use development. This type of land use development is not anticipated to not include any permanent sources of vibration that would expose persons in the project vicinity to excessive groundborne vibration levels. Therefore, project operational groundborne vibration level impacts would be considered less than significant.

Level of Significance Before Mitigation

Potentially significant impact.

Mitigation Measures

MM NOI-2 Construction Vibration Reduction Plan

- For any future development projects that would necessitate the use of pile-driving within 200 feet of an off-site structure, prior to the issuance of entitlements for a project, the project sponsor shall retain a Noise Specialist to prepare a Construction Vibration Reduction Plan for submittal to the City's Planning Director for review and approval that identifies specific techniques, such as the depth and location of temporary trenching, that would reduce potential vibration impacts to less than significant for the impacted structure. Upon approval by the City, the construction vibration reduction measures shall be incorporated into the construction documents. A note shall be provided on grading and building plans indicating that, during grading and construction, the property owner/developer

shall be responsible for requiring contractors, to be monitored via on-site inspection by the Community Development Department, to implement these measures to limit construction-related vibration impacts.

- For any future development projects that would necessitate the use of large vibratory rollers within 30 feet of an off-site structure, or the use of other heavy construction equipment within 15 feet of an off-site structure, the project sponsor shall retain a Noise Specialist to prepare a Construction Vibration Reduction Plan for submittal to the City's Director of Community Development for review and approval that identifies specific techniques, such as the depth and location of temporary trenching, that would reduce potential vibration impacts to less than significant for the impacted structure. Upon approval by the City, the construction vibration reduction measures shall be incorporated into the construction documents. A note shall be provided on grading and building plans indicating that, during grading and construction, the property owner/developer shall be responsible for requiring contractors, to be monitored via on-site inspection by the Community Development Department, to implement these measures to limit construction-related vibration impacts.

Level of Significance After Mitigation

Less than significant impact with mitigation incorporated.

Excessive Noise Levels from Airport Activity

Impact NOI-3:	Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not be located within the vicinity of a private airstrip or an airport land use plan and would not expose people residing or working in the project area to excessive noise levels.
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The Livermore Municipal Airport is located approximately 1 mile east of the city limits. At this distance, the potential sites for housing are located well outside of the airport's 60 dBA CNEL noise contours. Therefore, implementation of the Housing Element Update would not expose persons residing or working at the sites to noise levels from airport activity that would be in excess of normally acceptable standards. Therefore, no impact would occur.

Level of Significance

No impact.

3.11.5 - Cumulative Impacts

The geographic scope of the cumulative noise analysis is limited by the range of potential noise impacts. Noise impacts tend to be localized; therefore, noise impacts for traffic and stationary noise sources are limited to approximately 500 feet from the source. This analysis evaluates whether impacts of implementation of the Housing Element Update, together with impacts of cumulative development, would result in a cumulatively significant impact with respect to noise. This analysis then considers whether incremental contribution of the impacts associated with implementation of

the Housing Element Update would be significant. Both conditions must apply for cumulative effects to rise to the level of significance.

Construction Noise Impacts

The significance threshold for a cumulative construction noise impact would be a substantial temporary noise increase in areas in the vicinity of the potential sites for housing that already experience excessive noise levels from construction activities. There are no long-term development projects undergoing construction in the vicinity of the potential sites for housing that would constitute an existing cumulative impact. Furthermore, all future development projects within the city limits would be subject to the requirements of the Pleasanton Municipal Code. Therefore, there is no cumulative construction noise impact. Additionally, implementation of the Housing Element Update would not result in a potentially significant cumulatively considerable contribution to construction noise impacts within 500 feet of the potential sites for housing. As such, the Housing Element Update, in conjunction with other planned and approved projects, would result in a less than significant cumulative impact with respect to construction noise.

Traffic Noise Impacts

The significance threshold for a cumulative traffic noise impact would be a substantial permanent increase in traffic noise levels in the vicinity of the potential sites for housing along any roadway segment that already experiences noise levels in excess of normally acceptable standards for adjacent land uses. As shown in Table 3.11-7, several modeled roadway segments currently experience traffic noise levels that exceed the City's land use compatibility standards for residential land use development that could occur on the potential sites for housing. This would be considered an existing cumulative impact. However, as shown in the traffic noise impact discussion above (Impact NOI-1), for each of the existing impacted roadway segments, implementation of the Housing Element Update would not result in a considerable contribution to this existing cumulative impact (see Table 3.11-7). As such, the Housing Element Update, in conjunction with other planned and approved projects, would result in a less than significant cumulative impact with respect to traffic noise impacts.

Stationary Source Operational Noise Impacts

The significance threshold for a cumulative stationary source operational noise impact would be a substantial temporary noise increase at any location that is already exposed to excessive noise levels from stationary source operational noise. All existing and future development in the city are and would be required to comply with the City's operational noise performance standards of the Municipal Code, which establish maximum acceptable noise limits and/or permissible hours of operation which ensure maintenance of acceptable interior noise levels for receiving land uses. Therefore, there are no permanent stationary noise sources that would constitute an existing cumulative noise impact. As discussed in the stationary source noise impact discussion (Impact NOI-1), any development consistent with the Housing Element Update that would have stationary noise sources would be required to prepare a site-specific analysis and incorporate design measures, where necessary, to ensure potential impacts would be reduced to less than significant as measured at the project property plane, in compliance with MM NOI-1. As such, the Housing Element Update,

in conjunction with other planned and approved projects, would result in a less than significant cumulative impact with respect to noise impacts associated with stationary sources.

Construction Vibration Impacts

Construction-related groundborne vibration impacts are very localized; therefore, only areas within approximately 50 feet of a construction site could potentially be affected by groundborne vibration resulting from construction activities. There are no long-term development projects undergoing construction within 50 feet of the potential sites for housing that would constitute an existing cumulative groundborne vibration impact. Therefore, since there is not an existing cumulative groundborne vibration impact in the within 50 feet of the potential sites for housing, implementation of the Housing Element Update would result in a less than significant cumulative impact related to construction groundborne vibration. Therefore, there is no cumulative groundborne vibration impact, and groundborne vibration levels from implementation of the Housing Element Update would not result in a cumulatively considerable contribution to this less than significant cumulative impact.

Operational Groundborne Vibration Impacts

The only cumulatively considerable contribution to groundborne vibration conditions in the project vicinity would result from introduction of new permanent sources of groundborne vibration to an existing impacted environment. The only major source of groundborne vibration in the vicinity of the potential sites for housing is railroad activity along the rail line that goes through the city. Implementation of the Housing Element Update would not increase railroad activity and therefore would not introduce any new permanent sources of groundborne vibration in the vicinity of the potential sites for housing. Therefore, implementation of the Housing Element Update would not result in a potentially significant cumulatively considerable contribution to vibration conditions. As such, the Housing Element Update, in conjunction with other planned and approved projects, would result in a less than significant cumulative impact with respect to permanent sources of groundborne vibration.

Level of Cumulative Significance

Less than significant impact.

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3.12 - Population and Housing

3.12.1 - Introduction

This section of the Draft Program Environmental Impact Report (Draft Program EIR) addresses potential environmental effects related to population and housing resulting from implementation of the proposed 2023-2031 (6th Cycle) Housing Element Update, rezonings, General Plan and Specific Plan Amendments (collectively referred to herein as the Housing Element Update). Future discretionary projects consistent with the Housing Element Update will be evaluated for project-specific impacts related to population and housing at the time they are proposed. Information included in this section is based, in part, on the City of Pleasanton General Plan (General Plan), Pleasanton Municipal Code (Municipal Code), databases and reports maintained by the California Department of Finance (CDF), Association of Bay Area Governments (ABAG), and Alameda County (County). Once the Housing Element Update is adopted, the General Plan would be amended to include the Housing Element Update. Therefore, all references to the General Plan include the Housing Element Update.

3.12.2 - Existing Conditions

Population

San Francisco Bay Area

ABAG conducts long-term forecasts of population, households, and employment for the nine-county¹ San Francisco Bay Area (Bay Area) to project growth in the region. The Bay Area has experienced population growth over the past several decades, and that growth is expected to continue. The projection estimates that approximately 7,660,000 residents were living in the Bay Area in 2015.² ABAG and the Metropolitan Transportation Commission (MTC) project that the Bay Area's population will grow by 2.7 million people to approximately 10.3 million people by 2050.³

Alameda County

The CDF estimates that the total population of the County was 1,656,591 as of January 1, 2021.⁴ The CDF estimates that the County had an average household size of 2.78 persons per household and a total of 617,415 dwelling units as of January 1, 2021.⁵

¹ The Bay Area is defined as the nine counties that make up the region: Sonoma, Marin, Napa, Solano, Contra Costa, Alameda, Santa Clara, San Mateo, and San Francisco.

² Association of Bay Area Governments (ABAG) and Metropolitan Transportation Commission (MTC). 2021. Plan Bay Area 2050: Forecasting and Modeling Report, Table 8: Play Bay Area 2050 Baseline Forecast and Final Regional Growth Forecast. Website: https://www.planbayarea.org/sites/default/files/documents/Plan_Bay_Area_2050_Forecasting_Modeling_Report_October_2021.pdf. Accessed: February 28, 2022.

³ Association of Bay Area Governments (ABAG) and Metropolitan Transportation Commission (MTC). 2021. Plan Bay Area 2050: Forecasting and Modeling Report, Table 8: Play Bay Area 2050 Baseline Forecast and Final Regional Growth Forecast. Website: https://www.planbayarea.org/sites/default/files/documents/Plan_Bay_Area_2050_Forecasting_Modeling_Report_October_2021.pdf. Accessed: February 28, 2022.

⁴ California Department of Finance (CDF). 2021. Table 2: E-5 City/County Population and Housing Estimates. January 1.

⁵ Ibid.

City of Pleasanton

Population

The City of Pleasanton’s (City’s) population was estimated to be 78,371 in 2021 by the CDF.⁶

Historic Population Growth

The city’s population increased by 8,086 persons, or 11.5 percent, between 2010 and 2021. It should be noted that the city’s population peaked in 2019 at 78,840 and dropped from that peak in both 2020 and 2021. Table 3.12-1 summarizes the city’s historic population growth between 2010 and 2021.

Table 3.12-1: Historic Population Growth

Year	Population
2010	70,285
2011	70,879
2012	71,731
2013	72,048
2014	72,917
2015	74,842
2016	75,813
2017	76,421
2018	78,244
2019	78,840
2020	78,654
2021	78,371
Change (2010-2021)	8,086
	11.5%

Source: California Department of Finance (CDF). 2021. Table 2: E-5 City/County Population and Housing Estimates. January 1.

Housing

San Francisco Bay Area

During the 1990s, the Bay Area averaged an additional 18,700 units per year of new housing production.⁷ Growth in the Bay Area’s housing supply slowed down between 2010 and 2014 compared with previous decades, likely in part because of the effects of the Great Recession. Specifically, the Bay Area added an average of 9,600 units per year between 2010 and 2014,

⁶ California Department of Finance (CDF). 2021. Table 2: E-5 City/County Population and Housing Estimates. January 1.

⁷ Association of Bay Area Governments (ABAG). 2015. Executive Summary—State of the Region 2015: Economy, Population and Housing. Website: https://www.researchgate.net/publication/299483196_San_Francisco_Bay_Area_State_of_the_Region_Economy_Population_Housing_2015. Accessed March 10, 2022.

compared with an average of 23,200 units per year between 2000 and 2010. More recently, from 2010-2020, the Bay Area added an average of approximately 14,000 units per year.⁸

ABAG periodically develops Bay Area regional projections for population, households, and economic activity. These projections span four decades and include forecasts of 25 years into the future. ABAG calculates these projections based on a combination of economic relationships, policy development, and other factors. Based on ABAG projections for households from 2015 to 2050, the overall regional count of households is projected to grow from around 2.7 million households in 2015 to over 4 million households by 2050, or growth of 51.1 percent.⁹ The California Department of Housing and Community Development (HCD) forecasts the needed development of 441,176 new housing units in the Bay Area region between 2023 and 2031.¹⁰ According to ABAG, the majority of forecasted new housing units would fill the needs of projected household growth within the region.

Alameda County

The CDF provides historic housing growth estimates for Alameda County. According to the most recent housing estimate for 2021, there are 617,415 dwelling units in the County.¹¹ Alameda County’s housing stock increased by a little over 6 percent in the period between 2010 and 2021. The County’s housing unit count between 2010 to 2021 is summarized in Table 3.12-2.

Table 3.12-2: Alameda County Historic Housing Unit Count

Year	Dwelling Units
2010	581,372
2011	582,727
2012	584,049
2013	586,474
2014	588,948
2015	591,236
2016	593,664
2017	596,937
2018	601,967
2019	605,977
2020	611,752
2021	617,415

⁸ California Department of Finance (CDF). 2021. Table 2: E-5 City/County Population and Housing Estimates. Website: <https://dof.ca.gov/forecasting/demographics/estimates/estimates-e5-2010-2020/>. Accessed: July 7, 2022.

⁹ Association of Bay Area Governments (ABAG) and Metropolitan Transportation Commission (MTC). 2021. Plan Bay Area 2050: Forecasting and Modeling Report. Website: https://www.planbayarea.org/sites/default/files/documents/Plan_Bay_Area_2050_October_2021.pdf. Accessed: March 10, 2022.

¹⁰ Association of Bay Area Governments (ABAG). 2021. Final Regional Housing Needs Allocation (RHNA) Plan: San Francisco Bay Area, 2023-2031. December. Website: https://abag.ca.gov/sites/default/files/documents/2021-12/Final_RHNA_Allocation_Report_2023-2031-approved_0.pdf. Accessed March 10, 2022.

¹¹ California Department of Finance (CDF). 2021. Table 2: E-5 City/County Population and Housing Estimates. January 1.

Year	Dwelling Units	
Net Change	36,043	6.2 percent

Source: California Department of Finance (CDF). 2021. Table 2: E-5 City/County Population and Housing Estimates. January 1.

City of Pleasanton

The CDF also provides historic housing growth estimates for the city. The city’s housing stock increased by almost 10 percent in the period between 2010 and 2021. According to the most recent housing estimate for 2021, there are 28,602 dwelling units in the city. Alameda County’s housing growth between 2010 and 2021 is summarized in Table 3.12-3.¹² The city continued to experience an increase in housing units even as the city’s population declined from its 2019 peak.

Table 3.12-3: City of Pleasanton Historic Housing Unit Count

Year	Dwelling Units	
2010	26,053	
2011	26,069	
2012	26,132	
2013	26,174	
2014	26,305	
2015	26,732	
2016	26,980	
2017	27,176	
2018	28,054	
2019	28,404	
2020	28,508	
2021	28,602	
Net Change	2,549	9.8 percent

Source: California Department of Finance (CDF). 2021. Table 2: E-5 City/County Population and Housing Estimates. January 1.

Future Housing Needs

Per the 2023-2031 Regional Housing Need Allocation (RHNA), there is a need to build approximately 5,965 housing units at varying levels of affordability by 2031 in order to meet the housing needs of people at a range of income levels; refer to Table 3.12-4. The housing needs assessment portion of the Housing Element Update includes housing needs based on the current (2023-2031) RHNA minus the residential units approved or developed since the beginning of the planning period and what could be developed on vacant and underutilized land currently designated for residential

¹² California Department of Finance (CDF). 2021. Table 2: E-5 City/County Population and Housing Estimates. January 1.

development. Based on a preliminary evaluation of the capacity of existing sites zoned for residential development, there is a need to identify additional locations for future rezoning to allow for residential use, including sites suitable for both lower-income and market-rate housing to address the shortfall between the RHNA and the existing capacity. The housing needs assessment for the City of Pleasanton is presented in Table 3.12-4.

Table 3.12-4: Existing Residential Capacity and Projected Shortfall

RHNA Versus Existing Residential Capacity	Income Category				Total
	Number of Units–Very Low Income (<50 % of Area Median Income)	Number of Units–Low Income (50-80 % of Area Median Income)	Number of Units–Moderate Income (80-120 % of Area Median Income)	Number of Units–Above Moderate Income (>120 % of Area Median Income)	
RHNA-Pleasanton	1,750	1,008	894	2,313	5,965
Existing Residential Zoning					
Carryover from City of Pleasanton 2015-2023 (5 th Cycle) Housing Element (additional information provided in Table 2-6 in Chapter 2, Project Description)	825	376	442		1,643
Capacity from existing residential zoning	265	176	199		640
Pipeline Projects					
Entitled/Approved Projects (additional information provided in Table 2-7 in Chapter 2, Project Description)	23	—	393		416
Accessory Dwelling Units (ADU)s	5	28	46	14	93
Total Residential Capacity	1,146	598	1,048		2,792
Projected Shortfall¹	(1,612)	(296)	(1,265)		(3,173)
Notes: HCD = California Department of Housing and Community Development RHNA = Regional Housing Needs Allocation ¹ Although the analysis of existing capacity generally identifies production in more detail across affordability categories, HCD’s guidance treats planning for “lower income” housing in a manner that conceptually aggregates Extremely Low, Very Low, and Low Income categories, and therefore the table similarly aggregates them. Source: City of Pleasanton 2022.					

As shown in Table 3.12-4, the City’s share of regional housing for the 2023-2031 period is 5,965 dwelling units and the current inventory of land for production of housing, including sites with

existing residential zoning, pipeline projects, and accessory dwelling units (ADUs), is 2,792. Therefore, after accounting for units that are under construction and existing residential development approvals, the resulting unaccommodated units within the city is 3,173 dwelling units.

Affordable Housing

San Francisco Bay Area

As noted above, HCD estimated the San Francisco Bay Area's projected housing need from 2023-2031 at 441,176 residential units. Of these 180,334 need to be affordable to very low income and low income residents, as listed below:

- 114,442 units (25.9 percent) within the very low income level¹³ (0–50 percent of Area Median Income [AMI]);
- 65,892 units (14.9 percent) within the low income level (51–80 percent of AMI);
- 72,715 units (16.5 percent) within the moderate income level (81–120 percent of AMI); and
- 188,130 units (42.6 percent) within the above-moderate-income level (more than 120 percent of AMI).

Alameda County

According to ABAG forecasts, the County's projected housing need from 2023-2031 is 88,997 residential units, 37,197 of which are affordable to very low income and low income residents, as listed below:¹⁴

- 23,606 units (26.5 percent) within the very low income level¹⁵ (0–50 percent of AMI);
- 13,591 units (15.3 percent) within the low income level (51–80 percent of AMI);
- 14,438 units (16.2 percent) within the moderate income level (81–120 percent of AMI); and
- 37,362 units (42 percent) within the above-moderate-income level (more than 120 percent of AMI).

City of Pleasanton

According to ABAG forecasts, Pleasanton's projected housing need from 2023-2031 is 5,965 residential units, 2,758 of which are affordable to very low income and low income residents, as listed below:¹⁶

- 1,750 units (29.3 percent) within the very low income level¹⁷ (0–50 percent of AMI);

¹³ Extremely Low Income is included in the "Very Low" Income Category, of which it makes up 15 percent of the projected housing needs.

¹⁴ Association of Bay Area Governments (ABAG). 2021. Final Regional Housing Need Allocation, 2015-2023, Appendix 7: Draft RHNA Allocations. December. Website: https://abag.ca.gov/sites/default/files/documents/2021-12/Final_RHNA_Allocation_Report_2023-2031-approved_0.pdf. Accessed March 14, 2022.

¹⁵ Extremely Low Income is included in the "Very Low" Income Category, of which it makes up 15 percent of the projected housing needs.

¹⁶ Association of Bay Area Governments (ABAG). 2021. Final Regional Housing Need Allocation, 2015-2023, Appendix 7: Draft RHNA Allocations. December. Website: https://abag.ca.gov/sites/default/files/documents/2021-12/Final_RHNA_Allocation_Report_2023-2031-approved_0.pdf. Accessed March 14, 2022.

¹⁷ Extremely Low Income is included in the "Very Low" Income Category, of which it makes up 15 percent of the projected housing needs.

- 1,008 units (16.9 percent) within the low income level (51–80 percent of AMI);
- 894 units (15 percent) units within the moderate income level (81–120 percent of AMI); and
- 2,313 units (38.8 percent) within the above-moderate-income level (more than 120 percent of AMI).

Employment

San Francisco Bay Area

The Bay Area region experienced a strong recovery since the 2007–2009 Great Recession, with job growth proceeding at a pace greater than that experienced by the State of California or the United States as a whole. By mid-2013, the Bay Area had regained all the jobs lost during the Great Recession; however, utilizing 2000 as a baseline year, the average rate of growth was closer to zero compared to the peak of the dot-com boom era.¹⁸

The Bay Area region’s employment is projected to grow by 1.4 million jobs to just over 5.1 million jobs by 2050. Table 3.12-5 provides ABAG’s projections for employment for the Bay Area region between 2025 and 2050.

Table 3.12-5: San Francisco Bay Area Employment Projections

Year	Employment Projection
2025	4,050,000
2030	4,530,000
2035	4,680,000
2040	4,850,000
2045	4,980,000
2050	5,110,000

Source: Association of Bay Area Governments (ABAG) and Metropolitan Transportation Commission (MTC). 2021. Plan Bay Area 2050: Forecasting and Modeling Report, Table 8: Plan Bay Area 2050 Baseline Forecast and Final Regional Growth Forecast. Website: https://www.planbayarea.org/sites/default/files/documents/Plan_Bay_Area_2050_Forecasting_Modeling_Report_October_2021.pdf. Accessed: March 14, 2022.

Alameda County

In January 2022, the California Employment Development Department (EDD) estimated 784,700 employed persons and 35,700 unemployed persons, for an unemployment rate of 4.3 percent within Alameda County.¹⁹

¹⁸ Association of Bay Area Governments (ABAG). 2015. Executive Summary—State of the Region 2015: Economy, Population and Housing. Website: https://www.researchgate.net/publication/299483196_San_Francisco_Bay_Area_State_of_the_Region_Economy_Population_Housing_2015. Accessed March 14, 2022.

¹⁹ California Employment Development Department (EDD). 2022. Alameda County Profile. January. Website:

According to the U.S. Bureau of Labor Statistics, in January of 2022, the State of California had an unemployment rate of 5.8 percent.²⁰

City of Pleasanton

In January 2022, the EDD estimated 37,600 employed persons and 1,300 unemployed persons for an unemployment rate of 3.4 percent within the city.²¹

3.12.3 - Regulatory Setting

State

California Housing Element Law

The State Housing Element Law (Government Code Chapter 1143, Article 10.6, §§ 65580 and 65589) requires each city and county to adopt a general plan for future growth. This plan must include a housing element that identifies housing needs for all economic segments and provides opportunities for housing development to meet that need. The amount of housing that must be accounted for in a local housing element is determined through a process called the RHNA. In the RHNA process, the State gives each region a number representing the amount of housing needed based on existing need and expected population growth.

At the State level, the HCD estimates the relative share of the State's anticipated population growth that would occur in each county in the State, based on CDF population projections and historic growth trends. Where there is a regional council of governments, as in the San Francisco Bay Area (in this case, the ABAG), the HCD provides the regional housing need to the council. The council then assigns a share of the regional housing need to each of its cities and counties. The process of assigning shares provides cities and counties the opportunity to comment on the proposed allocations. The HCD oversees the process to ensure that the council of governments distributes its share of the State's projected housing need.

Each city and county must update its general plan housing element on a regular basis pursuant to the requirements of Government Code Section 65580, *et seq.* Among other things, the housing element must incorporate policies and identify potential sites that would accommodate a city's share of the regional housing need. Before adopting an update to its housing element, a city or county must submit the draft to the HCD for review. The HCD will advise the local jurisdiction whether its housing element complies with the provisions of California Housing Element Law. The regional councils of governments are required to assign regional housing shares to the cities and counties within their region on a similar schedule. At the beginning of each cycle, the HCD provides population projections to the regional councils of governments, who then allocate shares to their

<https://www.labormarketinfo.edd.ca.gov/cgi/databrowsing/localAreaProfileQSResults.asp?menuChoice=localAreaPro&selectedarea=Alameda+County&selectedindex=1&geogArea=060400001&countyName=&employmentAll=on&employment=Unemployment+Rate&employment=Current+Employment+Statistics+%28CES%29&employment=Fast+Growing+Occupations&employment=Fast+Growing+Industries&employment=High+Wage+Occupations&SearchResult=3>. Accessed March 14, 2022.

²⁰ United States Bureau of Labor Statistics. 2022. Economy at a Glance. Website: <https://www.bls.gov/eag/eag.ca.htm#>. Accessed March 14, 2022.

²¹ California Employment Development Department (EDD). 2022. Unemployment Rate. Website: <https://www.labormarketinfo.edd.ca.gov/cgi/databrowsing/localAreaProfileQSMOREResult.asp?menuChoice=localAreaPro&criteria=unemployment+rate&categoryType=employment&geogArea=0604000013&more=More+Areas=January>. Accessed March 14, 2022.

cities and counties. The shares of the regional need are allocated before the end of the cycle so that the cities and counties can amend their housing elements by the deadline.

Senate Bill 375

Senate Bill (SB) 375, adopted in October 2008, calls upon each of California's Metropolitan Planning Organizations (MPOs) to develop an integrated transportation, land use, and housing plan known as a Sustainable Communities Strategy (SCS). The SCS must demonstrate how the region will reduce greenhouse gas (GHG) emissions through long-range planning. SB 375 also requires the RHNA, which anticipates housing need for local jurisdictions, to conform to the SCS, which is an opportunity to advocate for increased access to and distribution of affordable housing across the region. Plan Bay Area 2050 is the SCS for the Bay Area.

Assembly Bill 2345

Assembly Bill (AB) 2345 (Increase Maximum Allowable Density): This assembly bill of 2020 revised the requirements for developers of affordable and senior housing components receiving concessions and incentives as well as increasing the maximum density bonus available to developers.

Assembly Bill 1397

AB 1397 of 2017 amended the Government Code to strengthen the obligation for local agencies to identify and make available an adequate number of RHNA sites for all income levels in their housing elements. AB 1397 tightened requirements for the adequacy of sites, including nonvacant sites and sites included in a previous housing element, and requirements that identified sites have adequate infrastructure.²²

2019 Housing Bills

Governor Gavin Newsom signed 18 bills in October 2019 to address the Statewide housing crisis.²³ The bills incentivize affordable housing, encourage ADUs construction, and streamline permitting and approvals for residential development projects to address the California housing crisis. Consistent with these intentions and purposes, the Governor signed SB 113 by the Committee on Budget and Fiscal Review, which will enable the transfer of \$331 million in State funds to the National Mortgage Special Deposit Fund and establishes the Legislature's intent to create a trust to manage these funds to provide an ongoing source of funding for borrower relief and legal aid to vulnerable homeowners and renters.

The Governor signed the following bills to remove barriers and boost housing production:

- SB 330 establishes the Housing Crisis Act of 2019, which will accelerate housing production in California by streamlining permitting and approval processes, ensuring "no net loss" in zoning capacity and limiting fees after projects are approved.

²² Public Interest Law Project. 2021. AB 1397-Housing Element Site Requirements. Website: [chrome-extension://efaidnbmnnnibpcajpcglclefindmkaj/https://www.pilpca.org/wp-content/uploads/2021/06/PILP-AB-1397-Summary-Housing-Element-Sites-2021-Update.pdf](https://www.pilpca.org/wp-content/uploads/2021/06/PILP-AB-1397-Summary-Housing-Element-Sites-2021-Update.pdf). Accessed: June 10, 2022.

²³ Office of Governor Gavin Newsom. 2019. Governor Gavin Newsom Signs 18 Bills to Boost Housing Production. October 9. Website: <https://www.gov.ca.gov/2019/10/09/governor-gavin-newsom-signs-18-bills-to-boost-housing-production/>. Accessed June 10, 2022.

- AB 1763 creates more affordable housing by giving 100 percent affordable housing developments an enhanced density bonus to encourage development.
- AB 116 removes the requirement for Enhanced Infrastructure Financing Districts to receive voter approval prior to issuing bonds.
- AB 1485 builds on existing environmental streamlining law and encourage moderate income housing production.
- AB 1255 requires cities and counties to report to the State an inventory of its surplus lands in urbanized areas. AB 1255 then requires the State to include this information in a digitized inventory of State surplus land sites.
- AB 1486 expands Surplus Land Act requirements for local agencies, requires local governments to include specified information relating to surplus lands in their housing elements and annual progress reports, and requires the HCD to establish a database of surplus lands, as specified.
- SB 6 requires the State to create a public inventory of local sites suitable for residential development, along with State surplus lands.
- AB 1483 requires local jurisdictions to publicly share information about zoning ordinances, development standards, fees, exactions, and affordability requirements. AB 1483 also requires the HCD to develop and update a 10-year housing data strategy.
- AB 1010 allows duly constituted governing bodies of a Native American reservation or Rancheria to become eligible applicants to participate in affordable housing programs.
- AB 1743 expands the properties that are exempt from community facility district taxes to include properties that qualify for the property tax welfare exemption and limits the ability of local agencies to reject housing projects because they qualify for the exemption.
- SB 196 enacts a new welfare exemption from property tax for property owned by a Community Land Trust and makes other changes regarding property tax assessments of property subject to contracts with Community Land Trusts.

The construction of ADUs can also help cities meet their housing goals and increase the State's affordable housing supply. The Governor signed the following bills to eliminate barriers to building ADUs:

- AB 68 makes major changes to facilitate the approvals and development of more ADUs and address barriers to building. AB 68 reduces barriers to ADU approval and construction, which will increase production of these low-cost, energy-efficient units and add to California's affordable housing supply.
- AB 881 removes impediments to ADU construction through regulations restricting local jurisdictions' permitting criteria, clarifying that ADUs must receive streamlined approval, including if such units were constructed in existing garages or structures, and eliminating local agencies' ability to require owner-occupancy for 5 years.

- AB 587 provides a narrow exemption for affordable housing organizations to sell deed-restricted land to eligible low-income homeowners.
- SB 13 creates a tiered fee structure that charges ADUs more fairly based on their size and location. SB 13 also addresses other barriers by reducing the application approval timeframe, thereby creating an avenue to bring previously unpermitted ADUs into compliance with applicable local codes and enhancing an enforcement mechanism allowing the State to ensure that localities are complying with the ADU statute.
- AB 671 requires local governments' housing plans to encourage affordable ADU rentals and requires the State to develop a list of State grants and financial incentives for affordable ADUs.

2020 Housing Bills

- AB 725 requires that at least 25 percent of a metropolitan jurisdiction's share of the regional housing need for moderate-income housing be allocated to sites with zoning that allows at least four units of housing but no more than 100 units per acre of housing. AB 725 would require that at least 25 percent of a metropolitan jurisdiction's share of the regional housing need for above moderate-income housing be allocated to sites with zoning that allows at least four units of housing.
- AB 2345 increases the density bonus to developers who are willing to develop additional affordable units.
- AB 3308 allows school districts to utilize low-income housing tax credits to develop affordable housing for teachers and other school employees on district-owned land.

2021 Housing Bills

- SB 7 extends California Environmental Quality Act (CEQA) streamlining for qualifying environmental leadership development projects approved through 2025, thereby reinstating and expanding the former AB 900 streamlining process.
- SB 8 extends the provisions of SB 330, the Housing Crisis Act of 2019, from 2025 until 2030. It allows applicants who submit qualifying preliminary applications for housing developments prior to January 1, 2030, to utilize the protections of the Housing Crisis Act through January 1, 2034, with those applications subject only to the ordinances and policies in effect when the preliminary application is deemed complete, with limited exceptions. SB 8 clarifies that for purposes of the Housing Crisis Act, a "housing development project" may involve discretionary and/or ministerial approvals or construction of a single dwelling unit and adds demolition, relocation, and return rights.
- SB 9 requires, for qualifying parcels, ministerial approval of two-unit housing developments in single-family zoning districts and would allow single-family parcels to be subdivided into two lots.
- SB 10 allows local agencies to avoid CEQA review when upzoning parcels to allow up to 10 units per parcel, at a height specified by local ordinance, if the parcel is located in a qualifying transit-rich area or an urban infill site.

- SB 290 clarifies the State Density Bonus Law to extend incentives to student housing projects.
- SB 478 prohibits local governments from establishing a floor area ratio (FAR) that is less than 1.0 for projects of three to seven units or less than 1.25 for projects consisting of eight to ten units. Those local governments also cannot deny a qualifying project solely based on the fact that the lot area does not satisfy the minimum lot size requirement.

Regional

State Assembly Bill 2853 (Regional Housing Needs Allocation)

AB 2853, signed into law in 1980, mandates all cities address their regional “fair share allocation” of housing needs in relation to income group within the Housing Element within a General Plan. ABAG determines local fair share of regional housing through a variety of factors, including: market demand for housing, employment opportunities availability of suitable sites and public facilities based on local plans, commuting patterns with respect to differences between job creation and labor supply, type and tenure of housing, and the housing needs of farm workers. Additional informational about housing element law and the City’s RHNA for the 2023-2031 period is provided above in the Environmental Setting section.

Plan Bay Area 2050: A Vision for the Future

ABAG is the official comprehensive planning agency for the San Francisco Bay region, which is composed of the nine counties of Alameda, Contra Costa, Marin, Napa, San Francisco, San Mateo, Santa Clara, Solano, and Sonoma and contains 101 jurisdictions. On October 21, 2021, ABAG and the MTC, which is the region’s MPO, adopted Plan Bay Area 2050, the official regional long-range plan, charting a course for a Bay Area that is affordable, connected, diverse, healthy, and vibrant for all residents through 2050 and beyond.

Plan Bay Area 2050 connects the elements of housing, the economy, transportation, and the environment through 35 strategies that will make the Bay Area more equitable for all residents and more resilient in the face of unexpected challenges. In the short-term, the plan’s Implementation Plan identifies more than 80 specific actions for MTC, ABAG, and partner organizations to take over the next five years to make headway on each of the 35 strategies.²⁴

Local

City of Pleasanton General Plan

The General Plan, adopted in July 2009 and last amended in August 2019, codifies policies, standards, and programs that administer an overarching, long-term plan for physical development within the city. Development projects within the city must demonstrate consistency with the goals and policies outlined in the General Plan.

Housing Element

In addition to the RHNA, the Housing Element Update includes several programs intended to improve the quality of the Pleasanton’s housing inventory, conserve existing neighborhoods,

²⁴ Plan Bay Area 2050. 2022. Website: <https://www.planbayarea.org/finalplan2050>. Accessed June 10, 2022.

increase housing affordability, and remove potential constraints to housing for lower-income households and persons with special needs. Although the Housing Element Update is designed to encourage and facilitate new housing construction within the city, the Housing Element Update does not propose any specific development projects. Once the City of Pleasanton 2023-2031 (6th Cycle) Housing Element Update (Housing Element Update) is adopted, future development within the City would be required to adhere to the policies outlined in the updated document.

Goals, policies, and programs regarding population and housing in the Housing Element are provided in Chapter 2, Project Description, specifically, Goals 1, 2, 4, 5, 6, and 7; Policies 1.1, 1.2, 1.3, 1.4, 1.6, 1.7, 2.3, 2.5, 2.7, 4.1, 4.2, 4.3, 5.1, 6.1, 6.2, 6.3, and 7.2; and Programs 1.1, 1.3, 1.4, 1.6, 1.7, 1.8, 1.9, 1.10, 2.2, 2.3, 2.4, 2.7, 4.2, 4.3, 5.6, 6.1, 7.2 provide guidance for population and housing.

Residential Growth Management System

The Growth Management Program (GMP) is intended to facilitate residential development at a rate that can be accommodated by the City's infrastructure, facilities, and services while supporting new job growth and allowing the development of Pleasanton's share of the regional housing needs. The Housing Element Update specifies the following with respect to the GMP:

Program 4.3 Suspend enforcement of the Growth Management Program Ordinance (Pleasanton Municipal Code 17.32) as necessary to comply with State law, specifically the Housing Crisis Act (SB 330). The Housing Element Update does not propose any revisions to the existing GMP, which includes a Growth Management Report. The Growth Management Report would continue to monitor the numbers and types of units at all income levels. In addition, the GMP would be used to inform decision-makers of the City's progress in meeting its housing goals and to guide them in making housing allocations sufficient to meet the City's housing needs. However, pursuant to Program 4.3, the City would suspend enforcement of the Growth Management Program and Ordinance as necessary to comply with State law, specifically the Housing Crisis Act (SB 330).

The existing Growth Management Ordinance can be amended to provide a mechanism to override its annual allocations to approve projects, especially affordable housing projects, to meet its total regional housing goals; this enables the City to allow larger high-density housing projects with large percentages of affordable housing to be approved.

Pleasanton Municipal Code

Inclusionary Zoning Ordinance

Chapter 17.44, Inclusionary Zoning, of the Pleasanton Municipal Code (Municipal Code) facilitates the development and availability of housing affordable to a broad range of households with varying income levels within the city.

For each residential development (rental or ownership) consisting of 15 or more total units, the City requires:^{25,26}

- 15 percent of the units in multiple family developments (e.g., apartments and condominiums) be affordable to Very Low and Low Income Households (50 percent to 80 percent of the AMI)
- 20 percent of the units in single-family developments must be affordable to Very Low, Low, and Moderate Income Households (50 percent to 120 percent of AMI)

When the construction of affordable housing units within the same project is found to be impractical or infeasible, the City may consider alternative means to comply with the Inclusionary Zoning Ordinance (IZO). Examples of alternate methods of compliance are listed below:^{27,28}

- **Off-Site Projects:** Must be determined to be consistent with the City's affordable housing goals.
- **Land Dedication:** An applicant may dedicate land to the City or to a local nonprofit housing developer in lieu of actual construction of affordable units. Dedicated land must meet City requirements.
- **Credit Transfers:** Project owners may request inclusionary unit credits in the event a project exceeds the total number of inclusionary units required on a site. These credits can then be used to meet the inclusionary requirement for another project.
- **Alternate Methods of Compliance:** Applicants may propose creative concepts for meeting the requirements of the IZO in order to bring down the cost of providing inclusionary units on- or off-site.
- **Lower Income Housing Fee Option:** In lieu of providing inclusionary units in a project, an applicant may pay the City's Lower Income Housing Fee (subject to approval by the City Council).

3.12.4 - Project Impacts and Mitigation Measures

Significance Criteria

The City has decided, in its discretion, to utilize Appendix G of the State CEQA Guidelines as thresholds of significance for this project. To determine whether impacts related to population and housing are significant environmental effects, the following questions are analyzed and evaluated.

Would the Housing Element Update:

²⁵ City of Pleasanton. 2000. Chapter 17.44 Inclusionary Zoning. November. Website: <https://dev.cityofpleasantonca.gov/civicax/filebank/blobdload.aspx?blobid=22788>. Accessed: March 16, 2022.

²⁶ City of Pleasanton. No date. Affordable Housing Development Incentives. Website: <https://www.cityofpleasantonca.gov/resident/housing/affordable.asp>. Accessed: March 16, 2022.

²⁷ City of Pleasanton. 2000. Chapter 17.44 Inclusionary Zoning. November. Website: <https://dev.cityofpleasantonca.gov/civicax/filebank/blobdload.aspx?blobid=22788>. Accessed: March 16, 2022.

²⁸ City of Pleasanton. No date. Affordable Housing Development Incentives. Website: <https://www.cityofpleasantonca.gov/resident/housing/affordable.asp>. Accessed: March 16, 2022.

- a) Induce substantial unplanned population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)?
- b) Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere?

Approach to Analysis

Impacts related to population, housing, and employment were determined by analyzing existing and projected population, housing, and employment estimates provided by the CDF, ABAG, and the General Plan. The project's impacts were evaluated by determining their consistency with these projections, estimates, and the General Plan.

Impact Evaluation

Population Growth

Impact POP-1: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not induce substantial unplanned population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure).

In preparing the RHNA, ABAG convened the Housing Methodology Committee (HMC)²⁹ in October 2019 to provide guidance to staff on the methodology used to distribute to each local government a fair share of the region's total housing need. The HMC recommended a methodology that advances the five RHNA objectives identified in Housing Element Law and is consistent with the forecasted development pattern from Plan Bay Area 2050, as required by law. The ABAG Executive Board adopted the Housing Methodology and Final RHNA in December 2021, which was subsequently approved by HCD in January 2022.

Because the Housing Element Update would provide sufficient sites to accommodate the RHNA allocation for the City, the population growth associated with development of those sites would be consistent with the forecast growth in Plan Bay Area 2050.³⁰ Plan Bay Area 2050 aggregates forecast growth into a series of 34 "superdistricts"—Pleasanton is part of Superdistrict 15, East Alameda County, which includes Pleasanton, Dublin, Livermore and the eastern portion of unincorporated Alameda County. This Superdistrict is projected to grow by 60,000 households for a total of 132,000 households by 2050 (interim year forecasts are not provided).³¹ The increase of 5,965 units in the RHNA would be well within the forecast total.

²⁹ The Housing Methodology Committee (HMC) was comprised of 9 elected official (one from each Bay Area county), 12 jurisdiction housing or planning staff (at least one from each county), 16 regional stakeholders representing diverse perspectives, from equity and open space to public health and public transit, and 1 partner from state government. The HMC Roster can be accessed here: <https://abag.ca.gov/our-work/housing/rhna-regional-housing-needs-allocation/housing-methodology-committee#:~:text=The%20HMC%20was%20a%20key,the%20Bay%20Area's%20housing%20challenges>.

³⁰ Association of Bay Area Governments (ABAG). 2022. RHNA-Regional Housing Needs Allocation. Website: <https://abag.ca.gov/our-work/housing/rhna-regional-housing-needs-allocation>. Accessed September 2, 2022.

³¹ Association of Bay Area Governments and Metropolitan Transportation Commission (ABAG/MTC). 2021. Plan Bay Area 2050 Forecasting and Modeling Report: Projected Household and Job Growth by Superdistrict. Website: https://www.planbayarea.org/sites/default/files/documents/Plan_Bay_Area_2050_Forecasting_Modeling_Report_October_2021.pdf. Accessed September 29, 2022.

Individual housing development projects may not necessarily occur on all the potential sites for housing, nor would every site necessarily be built to maximum proposed density; however, the sites could accommodate new housing development sufficient to meet RHNA identified housing needs. In addition, these estimates assume all residents are new to the City, though it is possible that existing residents that are currently sharing homes may relocate to new units. Furthermore, although the City is required to plan for housing development, the Housing Element Update does not directly approve or result in any specific construction, or require the construction, of any housing. Instead, the identification of potential sites for housing is intended to plan for and encourage cohesive housing development; however, development by property owners and developers is predominantly dependent on market forces.

The Housing Element Update would allow for projected population growth; however, for the reasons discussed throughout this impact analysis, it would not be unplanned. The Housing Element Update is a policy-level planning document that includes policies related to the development of a range of housing options, meets the City's housing needs with diverse household types and addresses housing insecurity. As growth occurs, housing would serve all income levels, including very low-, low-, moderate-, and above-moderate-income residents and special needs residents. The increase in affordable housing is intended to provide opportunities for residents already living within the city rather than create new housing for people outside the city.

The Housing Element Update identifies sites for future residential development based on seven criteria including (1) site size and infill criteria, (2) proximity to modes of transportation, (3) proximity to services and amenities, (4) environmental impact/hazards, (5) impacts on sensitive resources, (6) height and mass compatibility, and (7) interest in site (the sites inventory and methodology can be found in Appendix B of the Housing Element Update, which is included as Appendix B to the Program EIR). These criteria assisted the City in developing a comprehensive, iterative methodology to screen parcels for near-term development to identify the properties most suitable for the potential sites for rezoning.

Many of the Housing Element Update's policies and programs guide population growth within the city through 2031. Development within the potential sites for housing would be required to abide by policies and programs to ensure that new development or redevelopment does not induce substantial additional unanticipated or unplanned population growth, either directly or indirectly. Overall, the Housing Element Update accounts for the 2023-2031 RHNA for Pleasanton as prescribed by ABAG, plus a buffer of additional units. Program 1.1 in the Housing Element Update requires water, sewer, and dry utilities be provided at the potential sites for housing zoned for at least 30 units per acre. Program 1.7 facilitates the development of the large Kiewit (21a and b) and Stoneridge Mall (Site 2) properties which must occur in conjunction with preparation of an adoption of Specific Plan, Master Plan, or Planned Unit Development (PUD) to ensure adequate services are provided to service those developments.

Program 1.10 requires the annexation of Sites 1 (Lester) and 22 (Merritt) to the City prior to development of housing. The annexation process would ensure adequate services within the city would be available for future residential development on those sites. Policy 2.5 requires the City to apply for federal, State, and regional grants for mixed-use development near transit centers; this

funding would be utilized, in part, to upgrade infrastructure and transportation needed to support new high-density and transit-oriented development. Policy 4.2 requires the City to ensure adequate infrastructure is available to support future planned residential growth. Policy 5.1 mandates that the City provide housing in residential, mixed-use and infill areas, especially near high frequency transit and other services. Goal 6 requires the City to plan effectively for new development and to ensure housing is developed in a manner that keeps pace with available infrastructure and services. With respect to the sites zoned for densities above 30 du/acre, which includes the Dublin-Pleasanton BART station property, Policy 6.1 requires those properties to be dispersed throughout the community. As described in Chapter 2, Project Description, the potential sites for rezoning were chosen based on seven criteria, and as shown in Chapter 2, Project Description, Exhibit 2-3, the high-density sites are dispersed throughout the city, in areas near public transit, major thoroughfares, shopping, and employment centers. Policy 6.3 encourages residential infill in areas where public facilities are or can be made to be adequate to support such development. As shown in Chapter 2, Project Description, many of the potential sites for housing are infill properties near transit and existing services. The Housing Element Update's policies and programs support the objectives of the City and would not result unplanned direct or indirect population growth.

The Municipal Code also contains regulations regarding housing and land use types that affect population. Title 18, Zoning of the Municipal Code implements the General Plan and provides a precise guide for the physical development of the City consistent with the goals and policies of the General Plan. As such, the Municipal Code would ensure that the Housing Element Update would not result in unplanned direct or indirect population growth.

Future development consistent with the Housing Element Update would be subject to review and approval by the City, including environmental compliance review. Future development would be required to demonstrate consistency with the Housing Element Update (including rezonings, General Plan, and Specific Plan Amendments) and comply with requirements of the General Plan protecting against substantial unplanned growth and displacement of existing residential uses.

Any indirect population growth associated with the Housing Element Update (i.e., jobs associated with the development of commercial space on Site 18 [Valley Plaza]) is already assumed and consistent with the growth projected in the Housing Element Update.

Because the Housing Element Update is the long-range blueprint for growth and housing development in the city, the additional population growth would be considered planned growth. Moreover, because the City has supported urban growth and development for almost 130 years and is served with infrastructure (e.g., roads, freeways, railroads, transit, water, sewer, storm drainage, electricity, natural gas, etc.), development consistent with the Housing Element Update would not result in indirect growth. Impacts would be less than significant.

Level of Significance

Less than significant impact.

Housing Displacement/Replacement Housing

Impact POP-2: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere.

The Housing Element Update would result in a significant impact if it would displace substantial numbers of people or existing housing which would require the construction of replacement housing elsewhere. None of the potential sites for rezoning include existing housing, except for Sites 1 (Lester), 11 (Old Santa Rita Area), and 22 (Merritt). Site 1 (Lester) includes two existing single-family homes, Site 22 (Merritt) includes one single-family home, and Site 11 (Old Santa Rita Area) includes five non-conforming apartment units. It is unlikely that the home on Site 22 (Merritt) would be demolished. The proposed Housing Element could result in the demolition of the existing single-family homes and apartments on Sites 1 (Lester) and 11 (Old Santa Rita Area). Assuming 2.99 persons per household for the single-family homes, a low-density housing type, and 2.2 persons per household factor for the condominiums, a high-density housing type, it is assumed the existing residential uses on the potential sites for rezoning currently house 17 residents. Furthermore, implementation of the Housing Element Update would result in the development of additional housing units at all affordability levels to support the city's growing population and future housing demands, as specified in the RHNA, by rezoning all or some of the potential sites for rezoning to accommodate housing development. Therefore, development of housing facilitated by the Housing Element Update would not displace substantial numbers of existing people or housing and would instead build housing on infill sites with access to existing infrastructure and public services.

In conclusion, implementation of the Housing Element Update and the rezoning of some or all of the potential sites for rezoning is not anticipated to displace a substantial number of people or housing units and would not require the construction of replacement housing elsewhere due to the displacement of housing or people. Therefore, there would be a less than significant impact related to population and housing displacement.

Level of Significance

Less than significant impact.

3.12.5 - Cumulative Impacts

The geographic scope of the cumulative impact analysis for population and housing is the Tri-Valley Planning Area, which includes the City of Pleasanton as well as the surrounding cities of Dublin, Livermore, and San Ramon and the Town of Danville. This analysis evaluates whether the impacts of the Housing Element Update, together with the impacts of cumulative development, would result in a cumulatively significant impact related to population and housing. This analysis then considers whether the incremental contribution to cumulative impacts associated with the implementation of the Housing Element Update would be cumulatively considerable. Both conditions must apply for a project's cumulative effects to rise to a level of significance.

As stated above, each city and county must update its general plan housing element on a regular basis pursuant to the requirements of Government Code Section 65580, *et seq.* Among other things,

the housing element must incorporate policies and identify potential sites that would accommodate a city's share of the regional housing need. The surrounding cities of Dublin, Livermore, and San Ramon and the Town of Danville are currently undergoing this process as well, and the RHNA for these jurisdictions is provided in Table 3.12-6. In addition, as discussed in Chapter 2, Project Description, there is existing residential zoned capacity and approved but not yet constructed projects within the City of Pleasanton that could result in additional housing within the city. Based on residential units/capacity for the existing sites zoned for residential uses, projected ADUs (8-year projection, based on the last 5 years of average annual production), and pipeline projects (projects entitled but not yet built), the number of units that could be built within Pleasanton would be 2,486 units. Assuming factors of 2.99, 2.48, and 2.2 persons per household for low-,³² medium-,³³ and high-density housing types,³⁴ respectively, this existing zoned and pipeline capacity could result in an additional population of 5,963.

As shown in Table 3.12-6, the housing element updates for each of the jurisdictions would allow for population growth but, for the reasons listed below, it would not be unplanned.

As discussed above, the RHNA allocation for each Bay Area city is consistent with the forecasted development pattern from Plan Bay Area 2050, as required by law. Plan Bay Area 2050 aggregates forecast growth into a series of 34 "superdistricts"—Pleasanton is part of Superdistrict 15, East Alameda County, which includes Pleasanton, Dublin, Livermore and the eastern portion of unincorporated Alameda County. This Superdistrict is projected to grow by 60,000 households for a total of 132,000 households by 2050 (interim year forecasts are not provided).³⁵ The increase of 21,606 units in each jurisdiction's RHNA would be well within the forecast total.

Therefore, because each city's housing element would accommodate the required housing and associated population growth as required by the RHNA (which is consistent with and planned for in Plan Bay Area 2050), the respective housing element updates for the jurisdictions described above would also be consistent with Plan Bay Area 2050.³⁶

³² Low density includes a density range of 2-7 dwelling units/acres (du/acre). Typical housing types include detached single-family units and duplexes.

³³ The medium-density classes includes both low-medium density and medium density. Low medium includes a density range of 8-14 dwelling unit/acre. Typical housing types include small lot single-family homes, townhomes, and small-scale apartment buildings. Medium density includes a density range of 15-25 dwelling unit/acre. Typical housing types include attached apartments, condominiums, and townhomes with surface parking.

³⁴ High density includes a density range of 30 plus dwelling units/acres. Typical housing types include attached apartments and condominiums with structured parking.

³⁵ Association of Bay Area Governments and Metropolitan Transportation Commission (ABAG/MTC). 2021. Plan Bay Area 2050 Forecasting and Modeling Report: Projected Household and Job Growth by Superdistrict. Website: https://www.planbayarea.org/sites/default/files/documents/Plan_Bay_Area_2050_Forecasting_Modeling_Report_October_2021.pdf. Accessed September 29, 2022.

³⁶ Association of Bay Area Governments (ABAG). 2022. RHNA-Regional Housing Needs Allocation. Website: <https://abag.ca.gov/our-work/housing/rhna-regional-housing-needs-allocation>. Accessed September 2, 2022.

Table 3.12-6: 2023-2031 Regional Housing Needs Allocation for the Cities of Dublin, Livermore, San Ramon, and the Town of Danville

RHNA	Income Category				Total Units Required Under RHNA	Average Persons per Household ¹	Population as of January 2021	Estimated Population Associated with Construction of Units to Meet RHNA	Estimated Population with Addition of RHNA Units
	Number of Units–Very Low Income (<50 % of AMI)	Number of Units–Low Income (50-80 % of AMI)	Number of Units–Moderate Income (80-120 % of AMI)	Number of Units–Above Moderate Income (>120 % of AMI)					
Pleasanton	1,750	1,008	894	2,313	5,965	Varied	78,371	18,029	96,400
Dublin	1,085	625	560	1,449	3,719	2.77	64,695	10,302	74,997
Livermore	1,317	758	696	1,799	4,570	2.85	91,216	13,025	104,241
San Ramon	1,497	862	767	1,985	5,111	2.95	83,863	15,078	98,941
Danville	652	376	338	875	2,241	2.80	43,906	6,275	50,181

Notes:

ABAG = Association of Bay Area Governments

AMI = Area Median Income

RHNA = Regional Housing Needs Allocation

Rounded to the nearest percent

¹ Consistent with the average persons per household used throughout this Draft Program EIR, this table assumes 2.99, 2.48, and 2.2 persons per household for low-,³⁷ medium-,³⁸ and high-density housing types,³⁹ respectively.

Sources:

Association of Bay Area Governments (ABAG). 2021. Final Regional Housing Needs Allocation (RHNA) Plan: San Francisco Bay Area, 2023-2031, Table 4: Final RHNA Allocations.

California Department of Finance. 2021. Table 2: E-5 City/County Population and Housing Estimates. January 1.

³⁷ Low density includes a density range of 2-7 dwelling units/acres. Typical housing types include detached single-family units and duplexes.

³⁸ The medium density classes includes both low-medium density and medium density. Low-medium includes a density range of 8-14 dwelling unit/acre. Typical housing types include small lot single-family homes, townhomes, and small-scale apartment buildings. Medium density includes a density range of 15-25 dwelling unit/acre. Typical housing types include attached apartments, condominiums, and townhomes with surface parking.

³⁹ High density includes a density range of 30 plus dwelling units/acres. Typical housing types include attached apartments and condominiums with structured parking.

The general plans and other planning documents prepared by the City of Pleasanton as well as the surrounding cities of Dublin, Livermore, and San Ramon and the Town of Danville would be required to develop land use plans that comply with State law and that would accommodate the existing and forecasted population, similar to the long-range planning guidance included as part of the Housing Element Update. Consistent with State law, these planning documents would be required to provide adequate housing to accommodate forecasted numbers of people within the jurisdiction, and displaced development, if any, would be replaced primarily within the jurisdiction. Further, new development would be required to address potential environmental impacts as part of individual project review (including an analysis of infrastructure and public services to support such projects). As such, cumulative development would not induce substantial unplanned population growth, either directly or indirectly. Because cumulative projects would comply with all applicable land use plans to provide adequate development within a jurisdiction, cumulative impacts would be less than significant.

Moreover, the Housing Element Update would not have a cumulatively considerable contribution to the less than significant cumulative impact. The Housing Element Update is designed to address the City's housing needs in the city and to identify goals, programs, and policies that further the City's long-range planning objectives. As such, the Housing Element Update would not result in any policies or physical improvements that would result in direct or indirect unplanned regional growth or result in substantial displacement of people or the need to construct additional housing to accommodate displaced persons and therefore would not contribute to a cumulative impact.

Therefore, the Housing Element Update would not have a cumulatively considerable cumulative impact related to population and housing.

Level of Cumulative Significance

Less than significant impact.

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3.13 - Public Services and Recreation

3.13.1 - Introduction

This section of the Draft Program Environmental Impact Report (Draft Program EIR) addresses potential environmental effects related to fire protection services, police services, schools, and libraries resulting from implementation of the proposed 2023-2031 (6th Cycle) Housing Element Update, rezonings, General Plan and Specific Plan Amendments (collectively referred to herein as the Housing Element Update). This section also includes an overview of existing parks, recreational facilities, and open space areas and identifies potential impacts to City parks and recreational facilities, other regional and State Parks and open space areas from development consistent with the Housing Element Update. Future discretionary projects consistent with the Housing Element Update will be evaluated for project-specific impacts related to public services and recreation at the time they are proposed.

Once the Housing Element Update is adopted, the General Plan would be amended to include the Housing Element Update. Therefore, all references to the General Plan include the Housing Element Update.

3.13.2 - Environmental Setting

Fire Protection and Emergency Medical Services

The Livermore-Pleasanton Fire Department (LPPFD) is jointly operated by the cities of Livermore and Pleasanton and firefighters and paramedics are dispatched to a variety of incidents, including structure fires, hazardous materials, medical calls, and traffic accidents. The LPPFD has a daily staffing level of 36 personnel, which occupy 10 fire stations and provide emergency response to the cities of Livermore and Pleasanton.¹

City of Pleasanton

The City of Pleasanton (City) has five fire stations and a daily staffing level of 18 personnel. There are four Type 1 Engine Companies with a mix of three and four personnel, one ladder truck with four personnel, and one Battalion Chief on duty each day. The minimum paramedic staffing each day is five personnel, and each company has at least one assigned paramedic. The remaining personnel are all either Paramedic or Emergency Medical Technician (EMT) qualified.²

These companies all cross staff a host of apparatus from their respective fire station, which include two Type 3 Engines, three Type 6 Engines, one Hazardous Materials Unit, one rescue boat, one Utility Terrain Vehicle (UTV) Special Response Vehicle, and one State Office of Emergency Services (OES) Type I Engine.

¹ Solak, Jason. Deputy Fire Chief: Operations. Livermore-Pleasanton Fire Department. Personal communication: email. April 22, 2022.

² Ibid.

The fire stations that would serve the potential sites for rezoning, including the respective street address of each station, staffing, and average reflex time,³ is provided in Table 3.13-1 and the location of each fire station in relation to the potential sites for rezoning is shown in Exhibit 3.13-1. The actual total reflex time compliance rate for LPFD, the percentage of times the LPFD meets the standard reflex time goal, is 72 percent.⁴

Table 3.13-1: Fire Stations

Site Number	Site Name	Station Serving Sites	Street Address	Staffing	Average Reflex Time for Fire Station in 2019
19	Black Avenue	Fire Station 1	3560 Nevada Street	-3-Person Advanced Life Support Engine Company (Captain-Engineer-FF/Paramedic)-1 Battalion Chief Cross Staff: -1 Type 6 Engine -1 Rescue Boat -1 UTV Special Response Vehicle	6 minutes and 6 seconds
20	Boulder Court				
21a and 21b	Kiewit				
1	Lester	Fire Station 2	6300 Stoneridge Mall Road	-4-Person Advanced Life Support Engine Company (Captain-Engineer-FF/Paramedic-FF/EMT) Cross Staff: -1 Type 3 Engine -1 Hazardous Materials Special Response Unit	5 minutes and 46 seconds
2	Stoneridge Shopping Center (Mall)				
3	PUSD-Donlon				
4	Owens (Motel 6 and Tommy T)				
5	Laborer Council				
6	Signature Center				
7	Hacienda Terrace	Fire Station 3	3200 Santa Rita Road	-4-Person Advanced Life Support Engine Company (Captain-Engineer-FF/Paramedic-	6 minutes and 16 seconds
8	Muslim Community Center				
9	Metro 580				

³ Reflex time is the total time it takes from call intake to the arrival of the first responder on scene. It includes the call processing time, the time it takes for a company to leave the station ("turnout" time), and travel time.

⁴ Solak, Jason. Deputy Fire Chief: Operations. Livermore-Pleasanton Fire Department. Personal communication: email. April 22, 2022.

Site Number	Site Name	Station Serving Sites	Street Address	Staffing	Average Reflex Time for Fire Station in 2019
11	Old Santa Rita Area			FF/EMT) Cross Staff: -1 Type 6 Engine	
12	Pimlico Area (North side)				
14	Pimlico Area (North side)				
15	Rheem Drive Area (southwest side)				
16	Tri-Valley Inn				
18	Valley Plaza				
29	Oracle				
22	Merritt	Fire Station 4	1600 Oak Vista Way	-3-Person Advanced Life Support Engine Company (Captain-Engineer-FF/Paramedic) Cross Staff: -1 Type 3 Engine -1 State OES Type 1 Engine	6 minutes and 16 seconds
23	Sunol Boulevard				
24	Sonoma Drive Area				
25	PUSD–District				
26	St. Augustine				
27	PUSD-Vineyard	Fire Station 5	1200 Machado Place	-3-Person Advanced Life Support Engine Company (Captain-Engineer-FF/Paramedic) Cross Staff: -1 Type 6 Engine	7 minutes and 53 seconds

Notes:
PUSD = Pleasanton Unified School District
Source: Solak, Jason. Deputy Fire Chief: Operations. Livermore-Pleasanton Fire Department. Personal communication: email. April 22, 2022.

Service Ratio

With a population of 78,371 in the city as of January 1, 2021, the LPFD has a current service ratio of approximately less than one full-time firefighter and emergency medical personnel per 1,000 residents. This does not include contracted emergency medical personnel. The LPFD noted that

industry best practice is the adoption of the National Fire Protection Agency (NFPA) 1710, Standard for the Organization and Deployment of Fire Suppression Operations, Emergency Medical Operations, and Special Operations to the Public by Career Fire Departments Scope, which outlines staffing and response capabilities for fire departments throughout the United States. NFPA 1710 currently outlines staffing for engine and trucks and makes recommendation on the number of personnel and resources needed to mitigate fire and Emergency Medical Services (EMS) emergencies depending safely and effectively on density or hazards. Those standards are provided below.

- High Hazard Occupancies: schools, hospitals, nursing homes, explosive plants, refineries, high-rise buildings, and other high life hazard or large fire potential occupancies.
 - Operational response capabilities: should include at least four engines, two ladder trucks, two Chief Officers and other specialized apparatus as may be needed: not less than 24 Firefighters and two Chief Officers, plus a Safety Officer and rapid intervention team (30 Personnel).
- Medium Hazard Occupancies: apartments, offices, mercantile, and industrial occupancies not normally requiring extensive rescue by firefighting forces.
 - Operational response capabilities: should include at least three engines, one ladder truck, one Chief Officer, and other specialized apparatus as may be needed; not less than 16 Firefighters and one Chief Officer, plus a Safety Officer and rapid intervention team (20 Personnel).
- Low Hazard Occupancies: one, two, or three-family dwellings, and scattered small businesses and industrial occupancies.
 - Operational response capabilities: should include at least two engines, one ladder truck, one Chief Officer, and other specialized apparatus as needed: not less than 12 Firefighters and 1 Chief Officer, plus a Safety Officer and rapid intervention team (17 Personnel).

Reflex Time

The LFPD bases its reflex times on the NFPA 1710, which defines levels of service, staffing, deployment capabilities, and other critical requirements for career fire departments. The LFPD aims to have the first responder on the scene of an emergency within 7 minutes of a call (which includes 1 minute for call intake, 1 minute for turnout time, and a 5-minute travel time), 90 percent of the time. In 2019,⁵ the average reflex time was approximately 6 minutes and 25 seconds, which meets the 7-minute target for reflex time.⁶ In 2019, within Pleasanton, the LFPD responded to 5,955 incidents (calls), including 152 for fire, 3,967 for EMS, 99 for hazardous conditions, and 1,737 (including service request, false alarms, good intent [nothing found], and canceled in route incidents. This represented a reduction of 1.63 percent from 2018; the average remained an increase of 4.9 percent over a 5-year period.⁷

⁵ The Draft Program EIR utilizes data from 2019 because that is the most recent data prior to the COVID-19 pandemic and provides a more accurate representation of reflex times.

⁶ Livermore-Pleasanton Fire Department. 2019. 2019 Annual Report. Website: <https://www.lpfire.org/about-us/annual-reports>. Accessed: July 7, 2022.

⁷ Ibid.

Police Protection

The Pleasanton Police Department operates out of two stations. One station is located at 4833 Bernal Avenue and the other is located at 6050 Stoneridge Mall Road, also known as the Joint Police Services Center (JPSC). The JPSC is a joint venture between Workday, the City of Pleasanton, and the Bay Area Rapid Transit (BART). which provides police protection services throughout the city. The Pleasanton Police Department has 83 sworn and 35 civilian positions and is divided into two Divisions: Patrol Operations and Investigations and Services.^{8,9} The Patrol Operations Division is currently staffed with 59 sworn officers and seven civilian personnel and includes patrol, traffic, Special Weapons and Tactics (SWAT), special enforcement, K-9, animal services, bicycle patrol, and special events. The Investigations and Services Division is currently staffed with 23 sworn officers and 27 civilian personnel and includes a criminal investigations unit, alternate response unit, special enforcement unit, youth and community services, a professional standards unit that covers personnel and training, and support services that covers dispatch and records. Each Division is commanded by a Captain. The fiscal year 2022 adopted budget for the Pleasanton Police Department was \$34,643,749.¹⁰

Police Activity

The Pleasanton Police Department responded to 59,473 calls for service in 2021; 54,679 calls in 2020; and 65,565 calls in 2019. Table 3.13-2 provides a summary of police activities from 2019-2021.

Table 3.13-2: Pleasanton Police Department Activity Summary (2019-2021)

Calls for Service	2019	2020	2021
Citizens Initiated	26,571	23,283	26,901
Officer Initiation	38,994	31,396	32,572
Total	65,565	54,679	59,473
Notes: The 2021 Annual Report is the most recently available information. Source: Pleasanton Police Department. 2021. Annual Report: 2021.			

Target Service Ratios and Response Times

The Pleasanton Police Department does not have a specific target civilian to officer ratio. Policy 27 in Chapter 5, Public Safety Element, includes a response time goal of 4 minutes for emergency calls and 20 minutes for general service calls. In 2021, the Pleasanton Police Department response times to Priority 1 (emergency) calls averaged 4 minutes and 19 seconds, which is just above the 4-minute

⁸ Pleasanton Police Department. 2022. Investigations and Services. Website: <https://www.cityofpleasantonca.gov/gov/depts/police/investigations/default.asp>. Accessed June 7, 2022.

⁹ Pleasanton Police Department. 2022. Patrol Operations Division. Website: <https://www.cityofpleasantonca.gov/gov/depts/police/patrol/default.asp>. Accessed June 7, 2022.

¹⁰ City of Pleasanton FY 2021/22-FY2022/23 Operating Budget. Website: [chrome-extension://efaidnbmnnnibpcajpcglclefindmkaj/https://dev.cityofpleasantonca.gov/civicax/filebank/blobdload.aspx?BlobID=35507](https://dev.cityofpleasantonca.gov/civicax/filebank/blobdload.aspx?BlobID=35507). Accessed June 7, 2022.

target. Non-emergency Priority 2 calls averaged 20 minutes and 15 seconds, which is beyond the 20-minute target.¹¹

Schools

The Pleasanton Unified School District (PUSD) provides transitional kindergarten through grade 12 education to residents within the city. The PUSD operates nine elementary schools (grades TK-5), three middle schools (grades 6-8), three high schools (grades 9-12), and one alternative education collaboration for students entering grade 11 or 12. Public schools are listed in Table 3.13-3 and their location in relation to the sites for rezoning are shown in Exhibit 3.13-2.

Table 3.13-3: Public Schools Serving Pleasanton

School	Address	2021-2022 Enrollment
Public		
Elementary Schools (K-5)		
Alisal Elementary	1454 Santa Rita Road	485
Donlon (Thomas H. Donlon) Elementary	4150 Dorman Road	727
Fairlands Elementary	4151 West Las Positas Boulevard	726
Hearst (Phoebe Apperson Hearst) Elementary	5301 Case Avenue	557
Lydiksen (George C. Lydiksen) Elementary	7700 Highland Oaks Drive	605
Mohr (Henry P. Mohr) Elementary	3300 Dennis Drive	577
Valley View Elementary	480 Adams Way	573
Vintage Hills Elementary	1125 Concord Street	562
Walnut Grove Elementary	1999 Harvest Road	652
Middle Schools (6-8)		
Hart (Thomas S. Hart) Middle School	4433 Willow Road	1,176
Harvest Park Middle School	49000 Valley Avenue	1,119
Pleasanton Middle School	5001 Case Avenue	1,027
High Schools (9-12)		
Amador Valley High School	1155 Santa Rita Road	2,672
Foothill High School	4375 Foothill Road	2,184
Village High School	4645 Bernal Avenue	78
Middle College High School at Las Positas College (11-12)	3000 Campus Hill Drive Room 2411	46

¹¹ Cox, Larry. Police Captain, Pleasanton Police Department. Personal communication: email. June 2, 2022.

School	Address	2021-2022 Enrollment
<p>Notes: This table does not include enrollment at Student Support Services Special Education Nonpublic School</p> <p>Source: Pleasanton Unified School District (PUSD). 2022. 7-Year Student Population Projections by Residence: Fall 2022-2028. Website: https://www.pleasantonusd.net/apps/pages/index.jsp?uREC_ID=296967&type=d&pREC_ID=758684. Accessed May 2, 2022.</p>		

Enrollment

Table 3.13-4 identifies the number of students enrolled in the PUSD by academic year. As shown in Table 3.13-4, PUSD enrollment peaked in the 2017-2018 school year and has decreased in subsequent years. PUSD prepared a student forecast from 2021-2028. The forecasted students are provided in Table 3.13-5.¹²

Table 3.13-4: Past Pleasanton Unified School District Enrollment

School Level	2014-15	2015-16	2016-17	2017-18	2018-19	2019-20	2020-21	2021-22
Elementary	6,271	6,263	6,119	6,165	6,255	6,185	5,947	5,677
Middle	3,594	3,634	3,717	3,680	3,644	3,547	3,420	3,393
High	4,903	4,857	4,942	5,019	5,079	5,146	5,102	5,014
Total	14,768	14,754	14,778	14,864	14,978	14,878	14,469	14,084

Sources: California Department of Education. DataQuest. Website: <https://dq.cde.ca.gov/dataquest/>. Accessed May 2, 2022.
Sheikholeslami, Ahmad. Assistant Superintendent, Pleasanton Unified School District (PUSD). Personal communication: email. April 13, 2022.

Table 3.13-5: Pleasanton Unified School District Enrollment – Projections for 2021-2028

School Level	2022	2023	2024	2025	2026	2027	2028
Elementary	5,653	5,611	5,620	5,830	5,815	5,928	5,971
Middle	3,298	3,179	3,071	3,033	2,988	2,952	2,906
High	4,885	4,782	4,674	4,617	4,492	4,397	4,343

Notes:
Numbers are rounded to the nearest student.

Sources:
Pleasanton Unified School District (PUSD). 2022. 7-Year Student Population Projections by Residence: Fall 2022-2028. Website: https://www.pleasantonusd.net/apps/pages/index.jsp?uREC_ID=296967&type=d&pREC_ID=758684. Accessed May 2, 2022.
Sheikholeslami, Ahmad. Assistant Superintendent, Pleasanton Unified School District (PUSD). Personal communication: email. April 13, 2022.

¹² Pleasanton Unified School District (PUSD). 2022. 7-Year Student Population Projections by Residence: Fall 2022-2028. Website: https://www.pleasantonusd.net/apps/pages/index.jsp?uREC_ID=296967&type=d&pREC_ID=758684. Accessed May 2, 2022.

Preschools

Three preschools (Horizon Early Education Center, Harvest Park iPals Preschool, and STEAM Preschool) are owned and operated by either private parties or PUSD on PUSD sites, and their location in relation to the sites for rezoning are provided in Table 3.13-6.

Table 3.13-6: Public Preschools in Pleasanton Unified School District

Preschool	Address
Horizon Early Education Center (Birth -36 months)	245 Abbie Street
Harvest Park iPals Preschool (3-5 years)	4900 Valley Avenue
STEAM Preschool (3-5 years)	4667 Bernal Avenue
Source: Pleasanton Unified School District (PUSD). Early Education and Preschool. Website: https://www.pleasantonUSD.net/apps/pages/index.jsp?uREC_ID=297947&type=d&pREC_ID=1127611 . Accessed May 2, 2022.	

Libraries

The Pleasanton Public Library, located at 400 Old Bernal Avenue, provides free public library and literacy services. The Pleasanton Public Library, a 30,178-square-foot library facility, is a single-location library with a current membership of 58,423 registered cardholders, which is approximately 70 percent of the total population of Pleasanton. This membership includes all PUSD middle and high school students under the Student Success Initiative. The library served an average of 1,700 visitors per day and checked out over one million titles in the last fiscal year before the COVID-19 pandemic limited open hours. The library is now fully reopened to 62 hours per week, 7 days per week.^{13,14}

The Pleasanton Public Library maintains a physical collection size of 163,325. The library provides core library services, including free access to books, magazines, recorded books, DVDs, CDs, e-books, and streaming video. The library provides on-site access to computers, including high-speed wireless internet access. The library provides on-site children's services, including story times and school outreach programs, teen programs and educational resources, literacy and ESL services, and programs and events for all ages.¹⁵

Parks and Recreation Facilities

State Parks

The California Department of Parks and Recreation (DPR) provides access to parks and open spaces within 279 State Park units, over 340 miles of coastline, 970 miles of lake and river frontage, 15,000 campsites, 5,200 miles of trails, 3,195 historic buildings, and more than 11,000 known prehistoric

¹³ Murphy, Heidi. Director of Library and Recreation, Pleasanton Library. Personal communication: email. March 29, 2022.

¹⁴ City of Pleasanton. 2016. Pleasanton Civic Center/Library Master Plan. Website: <http://www.cityofpleasantonca.gov/civicax/filebank/blobdload.aspx?BlobID=34561>. Accessed: May 3, 2022.

¹⁵ City of Pleasanton. Pleasanton Library. Website: <https://pleasantonlibrary.zendesk.com/hc/en-us>. Accessed: May 3, 2022.

and historic archaeological sites.¹⁶ The nearest State park to Pleasanton is the Lake Del Valle State Recreation Area, located approximately 14 miles southeast of the city and operated by the East Bay Regional Park District (EBRPD), which is described in more detail below.

Regional Parks

Pleasanton Ridge Regional Park, a 9,090-acre park owned and operated by EBRPD, is adjacent to the western city limits. The park provides hiking and biking trails, horseback riding, and picnicking.¹⁷ Shadow Cliffs Regional Recreation Area, a 266-acre park operated by EBRPD, is adjacent to the southeastern city limits. The park provides hiking, swimming, fishing, boating, and picnicking.¹⁸ Lake Del Valle State Recreation Area, a State Park operated by EBRPD, is approximately 2.3 miles southeast of the city and comprises 4,395 acres. The park provides hiking trails, horseback riding, kayak and boat rental, fishing, horseback riding, picnicking, and swimming. It is also the eastern gateway to the Ohlone Wilderness Trail, 28 miles of scenic back-country trail.¹⁹ Ohlone Wilderness Regional Preserve, operated by EBRPD, is approximately 6.5 mile south of the city, and comprises 9,737 acres. The park provides hiking trails, horseback riding, and camping.²⁰ The Iron Horse Regional Trail is an approximately 32 mile trail multi-use trail that follows the Southern Pacific Railroad right of way spanning from the City of Concord to the City of Pleasanton.

City of Pleasanton

Existing Parks and Open Space

As of 2022, the city has 46 parks that total 385 acres and 1,106 acres of open space, which contain trails for recreation use.²¹ Each park type provides a range of opportunities for active and passive recreation as described below.

- **Community parks** serve a citywide population and typically include sports facilities, such as lighted fields, tennis and basketball courts, swimming pools, public art, and recreational buildings. They are the City's largest developed parks and examples include Bernal Community Park, Muirwood Community Park and Val Vista Community Park. These larger parks also support biodiversity and wildlife.
- **Neighborhood parks** serve a smaller portion of the city than community parks and are usually within convenient walking and biking distance from residences. Several neighborhood parks within the city are located within 0.5 mile of a residential neighborhood. They usually have playgrounds, open turf areas, practice ballfields, public art, and/or picnic tables. They are usually between 1 and 5 acres. Examples include Walnut Grove Park and Vintage Hills Park.

¹⁶ California Department of Parks and Recreation (DPR). 2022. About Us. Website: https://www.parks.ca.gov/?page_id=91. Accessed April 6, 2022.

¹⁷ East Bay Regional Park District (EBRPD). 2022. Ohlone Wilderness Regional Preserve. Website <https://www.ebparks.org/parks/ohlone#attractions>. Accessed August 29, 2022.

¹⁸ East Bay Regional Park District (EBRPD). 2022. Shadow Cliffs Regional Recreation Area. Website <https://www.ebparks.org/parks/shadow-cliffs>. Accessed August 29, 2022.

¹⁹ East Bay Regional Park District (EBRPD). 2022. Del Valle Regional Park. Website: <https://www.ebparks.org/parks/del-valle#overview>. Accessed May 3, 2022.

²⁰ East Bay Regional Park District (EBRPD). 2022. Pleasanton Ridge Regional Park. Website <https://www.ebparks.org/parks/pleasanton-ridge>. Accessed August 29, 2022.

²¹ Crose, Michele. Assistant Director, Pleasanton Parks Department. Personal communication: email. April 14, 2022.

Neighborhood parks also provide the opportunity to maintain patches of wildlife habitat in the city.

- **Linear parks** are trails located along linear geographic features, including watercourses, shorelines, and public utility and transportation right-of-way. They have wider sections that can be used for amenities such as playgrounds, open turf areas, dog parks, benches, public art, and picnic tables. Linear parks are most often used for passive recreation and often link to trails, other parks, and open spaces. Linear parks and greenways also support wildlife movement and provide connections to open spaces. Examples include Preserve Trail and Pleasanton Canal Trail.
- **Specialty parks** provide specialized functions. Parks in this category include the Pleasanton Community Garden, located at Val Vista Community Park.

Table 3.13-7 provides a description of the existing parks and open space, condition, and amenities and the location of the parks and open space in relation to the potential sites for rezoning is provided in Exhibit 3.13-3.

Table 3.13-7: Parks and Open Space within the City of Pleasanton

Name	Address	Amenities	Condition
Amador Valley Community Park	4301 Black Avenue	Soccer fields, basketball courts, horseshoe pits, playground, picnic area and barbecue pits, restrooms, Dolores Bengtson Aquatic Center and Amador Recreation Center.	Good
Amaral Park	3400 Dennis Drive	Playground, picnic tables and barbecue pits, open fields, basketball courts	Good
Augustin Bernal Park	8200 Golden Eagle Way	Trails for hiking	Good
Bernal Community Park/Stanford Medicine Sports Complex	7001 Pleasanton Avenue	Playground, trails for hiking, soccer, baseball, football, open fields, picnic areas and barbeque pits	Good
Bicentennial Park	2401 Santa Rita Road	Century House	Park is in good condition – Building is in need of repair
BMX Park	3320 Stanley Boulevard	BMX track and picnic tables	Good
Callippe Preserve Golf Course	8500 Clubhouse Drive	Golf course, clubhouse, walking trail	Building Condition: good; clubhouse will need a new roof in the next 1–2 years Park Condition: good; major irrigation

Name	Address	Amenities	Condition
			system replacement should be considered in the next 5 years
Centennial Park	5353 Sunol Boulevard	Exercise course, horseshoes, bocce courts, picnic tables and barbeque pits	Good
Civic Park	100 Main Street	Picnic tables	Good
Creekside Park	5601 West Las Positas Boulevard	Playground, volleyball, baseball, tennis, basketball courts, picnic tables and barbeque pits	Good
Cubby's Dog Park	3200 West Lagoon Road	Fenced dog play area, agility structures for dogs, and picnic tables	Good
Del Prado Park	6701 Hansen Drive	Sports fields, basketball court, playground	Moderate: playground needs to be replaced and basketball court needs resurfacing; some concrete work is needed on pathways
Delucchi Park	4501 1 st Street	Barbeque pits and picnic tables	Good
Fairlands Park	4100 Churchill Drive	Basketball tennis courts, and playground	Good
Fawn Hills Park	1510 West Lagoon Road	Playground, basketball court, picnic tables and barbeque pits	Good
Hansen Park	5697 Black Avenue	Playground, baseball field, basketball court, barbeque pits and picnic tables	Good
Harding Park	5801 Gibraltar Drive	Playground, picnic tables	Good
Harvest Park	1401 Harvest Road	Playground, picnic tables	Moderate: irrigation system could use an upgrade for better water coverage
Heatherlark Park	5700 Northway Road	Playground, picnic tables	Moderate: playground needs to be replaced and repairs are needed on the concrete pathways
Ken Mercer Sports Park	5800 Parkside Drive	Baseball, softball, and soccer fields, basketball court, skate park, picnic area, picnic tables, and multiple playgrounds	Good
Kottinger Community Park	1000 Kottinger Drive	Barbeque pits and picnic tables	Good

Name	Address	Amenities	Condition
Kottinger Village Park	4100 Vineyard Avenue	Playground, basketball courts, picnic area	Good
Laurel Creek Park	5875 Laurel Creek Drive	Hiking trails, picnic area	Good
The Preserve Staging Area	6045 Laurel Creek Drive	Hiking trails	Moderate
Lions Wayside Park	4401 First Street	Band stand, picnic tables and barbeque pits	Good
McKinley Park	519 Kottinger Drive	Picnic tables	Moderate (mostly open space)
Meadowlark Park	8200 Regency Drive	Basketball court and volleyball court, playground, picnic area and barbeque pits	Good
Meadows Park	3301 West Las Positas Boulevard	Barbeque pit, basketball and volleyball courts, picnic tables, and playground	Good
Mission Hills Park	600 Junipero Street	Playground, picnic tables, barbeque pit and exercise course	Good
Moller Park	5500 Pleasanton Hill Road	Historical gold-panning site, playground, barbeque pit and picnic tables	Good: playground needs to be replaced
Muirwood Park	4701 Muirwood Drive	Athletic fields, picnic tables, playground, tennis courts, basketball courts, and dog park	Good
Nielsen Park	3755 Stoneridge Drive	Playground, basketball court, picnic tables and barbecue pits	Moderate: the basketball court needs to be resurfaced in the near future and a new playground is needed
Oakhill Park	4100 Muirwood Drive	Playground, picnic tables	Moderate: landscape renovation is needed
Orloff Park	1800 Santa Rita Road	Exercise course, basketball courts, picnic tables, and playground	Good
Owens Plaza Park	5700 Owens Drive	Playground, picnic tables, barbeque pits, and tennis courts	Good
Rotary Park	890 Main Street	Picnic tables	Good
Stoneridge Creek Park	3300 Stoneridge Creek Way	Open space attached to Stoneridge Creek Senior Living Center, picnic tables and tennis courts	Good

Name	Address	Amenities	Condition
Sutter Gate Park	4801 Sutter Gate Avenue	Concrete walking path, picnic tables, playground	Fair: this is a long, linear park; old asphalt pathways need to be removed and replaced
Tawny Park	400 Tawny Drive	Playground, basketball court, picnic tables	Good
Tennis and Community Park	5801 Valley Avenue	Barbeque pit, basketball court, picnic tables, tennis courts, playground, water play area and volleyball courts	Building Condition – moderate – park condition good
Upper Pleasanton Field	4645 Bernal Avenue	Baseball, multi-use field, picnic tables, and playground	Good
Valley Trails Park	3400 National Park Drive	Walking trails, picnic tables and barbeque pits, basketball court, playground	Good
Val Vista Community Park	7350 Johnson Drive	Skate park, picnic tables, soccer fields, in-line hockey rink, playgrounds, softball field, and playgrounds	Moderate: roller hockey rink needs major renovation to maintain playability; all playgrounds need to be replaced. The sand-based soccer fields are aging and require additional maintenance to meet user expectations
Veterans Park Plaza	550 Peters Avenue	Playground, picnic tables	Good
Vintage Hills Park	3301 Arbor Drive	Playground, picnic tables and barbeque pits,	Good
Walnut Grove Park	5150 Northway Road	Picnic tables and barbeque pits, playground	Good
Woodthrush Park	Woodthrush and Skylark	Concrete pathways	Good
Sources: Pleasanton: Library and Recreation Activities Guide Fall 2022/Winter 2023.			

Existing Recreational Facilities

Pleasanton owns and operates a robust and distributed network of recreational facilities. The City maintains 18 indoor recreational facilities and numerous outdoor facilities for sports, social gatherings, camps, and classes. Table 3.13-8 provides a description of the existing recreational facilities and their condition as well as their locations in relation to the potential sites for rezoning is provided in Exhibit 3.13-3.

Table 3.13-8: Public Recreational Facilities Within the City of Pleasanton

Name	Address	Usage	Condition
Pleasanton Public Library	400 Old Bernal Avenue	High usage: The library is open to the public 62 hours per week, 7 days per week, averaging 1,700 visitors per day.	Fair: the lighting system and carpet need repair and replacement; Roofing replacement is underway with completion in 2023
Alviso Adobe Community Park	3465 Old Foothill Road	Low: the park and facility have low to moderate schedule programming and drop-in use	Two of the three buildings are in excellent condition. The Adobe house is currently under repair and the 6-acre park is in excellent condition
Amador Recreation Center	4443 Black Avenue	Seasonal usage: summer is high due to camps and rentals – all other seasons are low usage for classes and rentals	Good
Amador Theater	1155 Santa Rita Road	Moderate usage: City youth theater programs and rentals during the school year	Fair: the building has structural issues, and the upstairs is in need of repair
Century House	2401 Santa Rita Road	Not currently in use	Poor: the building has been closed since 2014 because of significant structural issues
Cultural Arts Center	4477 Black Avenue	Low to moderate usage: summer is high because of summer camps/classes	Good
Dolores Bengtson Aquatic Center (located at Amador Valley Community Park)	4455 Black Avenue	Moderate to high usage: the pool is open 350 plus days a year and during the summer, the pool has high usage	Fair: one portion of the pool is newly renovated and in good condition; however, another portion needs deck replacement, and several pieces of necessary equipment are aging and in need of repair regularly
Firehouse Arts Center	4444 Railroad Avenue	High usage: City theater productions are held here; youth camps, art classes, City and partner events; Includes the Harrington Gallery with exhibit space	Good to Excellent: Building is 11 years old and LEED™-certified.

Name	Address	Usage	Condition
Gingerbread Preschool	4333 Black Avenue	High usage: all classrooms are utilized daily almost year round	Good
Harvest Park Middle School Gym	4900 Valley Avenue	Moderate to high: used for both City and school programs	Fair to good
Nature House	519 Kottinger Drive	Low to moderate usage: summer has a high usage because of summer classes	Good
Pleasanton Senior Center (located at Centennial Park)	5353 Sunol Boulevard	Pre-COVID attendance was high; attendance is slowly increasing to pre-COVID conditions	Good
Pleasanton Middle School Gym	5001 Case Avenue	Moderate to high: used for both City and school programs	Fair to good
Softball Field Complex	5800 Parkside Drive	Low to moderate for the building; the building is mostly utilized by staff with little to no community or visitor classes	Good
Tennis and Community Park	5801 Valley Avenue	High: attendance has always been high and has reached a peak because of COVID	Fair: structurally sound but the amenities are outdated
Thomas Hart Middle School Gym	4433 Willow Road	Moderate to high: used for both City and school programs	Fair to good
Veterans Memorial Building	301 Main Street	Moderate	Good

Source: Crose, Michele and Lia Bushong. Assistant Directors, Pleasanton Library and Recreation Department. Personal communication.

Park Service

Level of service standards are guidelines that define the amount of park and open space that are necessary to meet the needs of residents. The City has 46 developed park sites that total 385 acres,²² which is approximately 5.9 acres per 1,000 residents (based on a population of 78,371 as of January 1, 2021).²³ The City has 1,016 acres of open space,²⁴ which also contain trails for recreation use, which is approximately 13 acres per 1,000 residents (based on a population of 78,371 as of January

²² Crose, Michele. Assistant Director, Pleasanton Parks Department. Personal communication: email. April 14, 2022.

²³ California Department of Finance. 2021. Table 2: E-5 City/County Population and Housing Estimates. January 1.

²⁴ Crose, Michele. Assistant Director, Pleasanton Parks Department. Personal communication: email. April 14, 2022.

1, 2021).²⁵ The City currently meets or exceeds the parkland target of 5 acres per 1,000 residents (see Program 10.8, below).

3.13.3 - Regulatory Framework

State

California Fire Code and California Building Code

The International Fire Code and the International Building Code, established by the International Code Council (ICC) and amended by the State of California, prescribe performance characteristics and materials to be used to achieve acceptable levels of fire protection.

California Health and Safety Code

California Health and Safety Code, Sections 13100–13135, establish the following policies related to fire protection:

- **Section 13100.1:** The functions of the office of the State Fire Marshall, including the California Department of Forestry and Fire Protection (CAL FIRE), shall be to foster, promote, and develop strategies to protect life and property against fire and panic.
- **Section 13104.6:** The Fire Marshall has the authority to require fire hazards to be removed in accordance with the law relating to removal or public nuisances on tax-deeded property.

California Senate Bill 50

Senate Bill (SB) 50 (funded by Proposition 1A, approved in 1998) limits the power of cities and counties to require mitigation of school facilities impacts as a condition of approving new development and provides instead for a standardized developer fee. SB 50 generally provides for a 50/50 State and local school facilities funding match. SB 50 also provides for three levels of statutory impact fees. The application level depends on whether State funding is available, whether the school district is eligible for State funding and whether the school district meets certain additional criteria involving bonding capacity, year-round school, and percentage of movable classrooms in use.

SB 50 added the following language to Government Code Section 65996:

- (b) The provisions of this chapter are hereby deemed to provide full and complete school facilities mitigation and, notwithstanding Section 65858, or Division 13 (commencing with Section 21000) of the Public Resources Code, or any other provision of state or local law, a state or local agency may not deny or refuse to approve a legislative or adjudicative act, or both, involving, but not limited to, the planning, use, or development of real property or any change in governmental organization or reorganization, as defined in Section 56021 or 56073, on the basis that school facilities are inadequate.
- (c) For purposes of this section, "school facilities" means any school-related consideration relating to a school district's ability to accommodate enrollment.

²⁵ California Department of Finance. 2021. Table 2: E-5 City/County Population and Housing Estimates. January 1.

- (d) Nothing in this chapter shall be interpreted to limit or prohibit the ability of a local agency to utilize other methods to provide school facilities if these methods are not levied or imposed in connection with, or made a condition of, a legislative or adjudicative act, or both, involving, but not limited to, the planning, use, or development of real property or a change in governmental organization or reorganization, as defined in Section 56021 or 56073. Nothing in this chapter shall be interpreted to limit or prohibit the assessment or reassessment of property in conjunction with ad valorem taxes, or the placement of a parcel on the secured roll in conjunction with qualified special taxes as that term is used in Section 50079.

California Government Code, Section 65995(b) and Education Code, Section 17620

SB 50 amended Section 65995 of the California Government Code, which contains limitations on Section 17620 of the Education Code, the statute that authorizes school districts to assess development fees within school district boundaries. Section 65995(b)(3) of the Government Code requires the maximum square footage assessment for development to be increased every 2 years, according to inflation adjustments. School districts may levy higher fees if they apply to the State and meet certain conditions.

Local

City of Pleasanton

City of Pleasanton General Plan

Public Safety Element

The following goals, policies, and programs contained in the Public Safety Element are relevant to public services and recreational uses.

Fire Hazards and Emergency Response

- Goal 3** Minimize the risks to lives, property, and the environment to fire hazards within the Planning Area and provide the highest quality of emergency response feasible.
- Policy 8** Provide an adequate level of fire and emergency medical equipment and personnel to protect the community.
- Program 8.2** Require new development to pay for fire safety improvement needs generated by the new development.
- Program 8.4** Invest in equipment that assists emergency responders in accurately and quickly reaching the scene of an emergency.
- Policy 10** Strive to respond to all emergency fire-related calls within seven minutes of the time the call for service is received 90 percent of the time.
- Program 10.1** Deny proposed developments not within a five-minute travel time of a Fire Station unless acceptable mitigations are provided.
- Program 10.3** Evaluate the need for expanded services or facilities as the City grows.

Policy 11 Maintain or improve the City’s existing Insurance Services Office²⁶ protection rating of three.

Program 11.1 Require developers to finance and construct necessary water facilities for their projects when they develop.

Program 11.2 Require that all new developments be provided with sufficient fire-flow facilities at the time of development at least at the level specified by the Fire Chief.

Policy 12 Upgrade the level of fire resistivity in all new and remodeled structures.

Program 12.1 Continuously update and enforce the City’s Fire and Building Codes as new technologies occur.

Policy 13 Require fire mitigation measures in new and existing developments that reduce the fire threat to the structure and occupants. Require development outside the five-minute travel time and in Special Fire Protection Areas to provide effective fire prevention measures.

Program 13.1 Require the installation of building and fire code compliant fire-detection and alarm equipment in residential and commercial structures.

Program 13.2 Install automatic fire sprinkler protection in certain structures as required by adopted City ordinances.

Program 13.3 Encourage the installation of automatic fire sprinkler systems in all new construction.

Program 1.34 Provide adequate fire equipment access to all structures in the City.

Program 13.5 Partner with the California Department of Forestry and Fire Prevention and Firewise Communities to identify measures that reduce the fire threat in Special Fire Protection Areas.

Program 13.6 Where appropriate in Special Fire Protection Areas, require development to incorporate wildland interface mitigation measures such as greenbelts, defensible space around structure, and other preventive measures.

Program 13.7 Require all projects in the Special Fire Protection Areas seeking building or planning approval to landscape with fire resistant plant materials.

Police Services

Goal 8 Provide the highest quality of Police services within the City.

²⁶ The Insurance Services Office provides classifications from 1 through 10, to establish appropriate fire insurance premiums for residential and commercial properties. A classification of 1 represents superior fire protection, and a classification of 10 indicates that the area’s fire prevention programs do not meet the Insurance Services Offices minimum criteria.

- Policy 26** Work in collaboration with the community to provide the highest level of Police services, making Pleasanton a safer place to live, work, and play.
- Program 26.2** Require new development to pay for police safety improvements required of that development.
- Policy 27** Strive for a response time of an average of four minutes for emergency calls, and sixteen minutes for general service calls.
- Policy 29** Seek ways to reduce police service demands through the contemporary practice of “Crime Prevention Through Environmental Design.”
- Program 29.1** Incorporate crime reduction and public safety response features in the design and planning of private and public development.
- Program 29.2** Submit all discretionary use permits to the Police Department for analysis of, and recommendations to reduce, impacts on police services.

Public Facilities and Community Programs Element

- Goal 1** Provide sufficient public facilities and community programs to efficiently serve existing and future development while preserving and enhancing the quality of life for existing and future residents.
- Goal 2** Promote sustainability to minimize additional or expanded public facilities.

Capital Improvements and Financing

- Goal 3** Promote responsible financing and construction to preserve and enhance Pleasanton’s public facilities.
- Policy 2** Development should pay its fair share for the construction and use of municipal facilities.
- Program 2.1** Require future development to pay its fair share of the cost of purchasing sites and financing needed improvements for existing and future municipal facilities, such as a city hall, fire stations, athletic facilities, libraries, cultural arts center, etc.
- Policy 3** Require annexation to the City as a pre-requisite to utility extension
- Program 3.1** Encourage annexation of those parcels within the Pleasanton Sphere of Influence which are able and willing to pay for City services and utility extensions, where financially feasible for the City.
- Policy 5** To maintain City service standards, construct permanent City sewer, water, and storm drainage improvement as a condition of new development.
- Program 5.1** Coordinate developer financing with the City’s Capital Improvement Program to ensure adequate capacity for future growth.

Program 5.2 Evaluate infrastructure capacity and needed improvements as part of the City’s Growth Management Report.

Policy Continue to maintain and improve public facilities.

Program 6.1 Provide sustainable funding through taxes, fees or other means to maintain Pleasanton’s existing facilities and programs at General Plan buildout.

Schools and Education

Goal 4 Promote lifelong learning.

Policy 7 Encourage and support high quality public and private education facilities in Pleasanton and facilitate lifelong educational opportunities for all ages.

Program 7.2 Encourage school enrollment sizes that maintain neighborhood character, provide facilities for specialized programs, and promote more personalized education. The current target is 600 students per elementary school, 1,000 students at each middle school, and 2,000 students at each comprehensive high school, with a 10 percent contingency planned for each site, subject to board discretion and financial considerations.

Policy 8 Coordinate with the School District to maintain elementary schools within student walking distance whenever feasible and allow other community-related activities within these facilities.

Program 8.1 Partner with the School District and community groups to use schools as neighborhood centers. These neighborhood centers should offer a wide range of services and programs.

Library Facilities and Programs

Goal 5 Enhance the quality of Pleasanton library services.

Policy 9 Provide sufficient sites and improvements for a full range of library facilities to serve existing and future development.

Program 9.1 Annually review the operation and usability of the library. Library service levels should be maintained or improved to the fullest extent feasible.

Program 9.2 Continue to support a wide range of library services and programs addressing the needs of all segments of the Pleasanton community.

Program 9.3 Explore the expansion of Pleasanton Library services and associated facility needs.

Program 9.4 As part of the Civic Center Master Plan, consider various locations for an expanded library, including relocating the library to create a Downtown gateway on Main Street.

Parks and Recreation

- Goal 6** Achieve a complete park and recreation system featuring a wide variety of opportunities to serve the public need.
- Policy 10** Provide sufficient parkland and recreational activities to accommodate existing and future needs of residents, workers, and visitors.
- Program 10.2** Encourage developers to dedicate public park acreage in areas designated for park use on the General Plan Map rather than contribute in-lieu fees.
- Program 10.3** Disperse neighborhood and community parks throughout the City and combine them with areas of natural, scenic, or cultural resources.
- Program 10.4** Provide a wide variety of active and passive recreational facilities to accommodate the needs of all ages in a diverse and inclusive community. Conduct periodic public surveys to ascertain the park and recreational needs of the community.
- Program 10.5** Develop neighborhood, community, and regional parks in accordance with the General Plan goals and the land use diagram.
- Program 10.6** Provide additional lighted facilities in appropriate park locations to accommodate the community's nighttime recreational needs. Potential new sites include the Bernal Property, Staples Ranch Community Park or another community park.
- Program 10.7** Provide community parks with adequate parking facilities to the greatest extent possible.
- Program 10.8** Locate parks within one-half mile of the residential area they serve. To the greatest extent possible, such parks should not be separated from the neighborhood they serve by major arterials, commercial centers, and topographical or other features which create a direct or perceived physical barrier to the park.
- Program 10.11** Support non-traditional recreational opportunities such as designated dog exercise areas in new or existing parks.
- Program 10.13** Encourage the establishment of recreational opportunities for business park employees in conjunction with the development of business parks.
- Program 10.14** Continue to support non-traditional sports which serve the public need and investigate opportunities to provide facilities for them (non-traditional sports might include skateboarding, rollerblading, rock-climbing, BMX, racquetball, sports facilities for the disabled, etc.).
- Program 10.15** Explore the construction of additional indoor recreation facilities.
- Program 10.16** Undertake a study of recreational needs for teens.

Program 10.17 Continue to use the Alameda County Fairgrounds for recreational and cultural activities.

Program 10.18 Maintain at least the standard of 5 acres of neighborhood or community parks per 1,000 people.

Program 10.22 Provide trails, bike routes or pedestrian walkways to connect the parks and recreational facilities throughout Pleasanton.

Community Facilities and Cultural Arts

Goal 8 Improve quality of life in the City by adding and maintaining appropriate new community amenities.

Policy 18 Provide additional public facilities to enhance the community.

Program 18.1 After obtaining the Pleasanton Pioneer cemetery, renovate, preserve, and maintain these facilities to improve the urban design of the area and to help preserve historic resources.

Policy 22 Facilitate the provision of safe, affordable, high quality child-care facilities and services to families.

Program 22.2 Require developers of private and public projects to include child-care facilities and/or programs, where feasible.

Conservation and Open Space Element

The following goals, policies, and programs contained in the Conservation and Open Space Element are relevant to public services and recreational uses.

Goal 6 Achieve an extensive open space system featuring a wide variety of opportunities to serve the diverse needs of the public.

Policy 7 Preserve and expand open space opportunities, including open space access to the public.

Program 7.1 Support expansion of the East Bay Regional Park District's Pleasanton Ridge Park in areas designated as Open Space.

Program 7.2 Work cooperatively with Alameda County, the City of Hayward, and the East Bay Regional Park District to retain Pleasanton Ridge as permanent open space lands.

Program 7.3 Encourage public accessibility to appropriate public open space land or in private open space land that could accommodate public-access open space trails.

Program 7.4 Provide adequate parking and staging areas for open space access and include facilities such as picnic areas, restrooms, and potable water.

- Goal 7** Promote expansion and maintenance of a trail system that serves Pleasanton’s diverse population while respecting and protecting the integrity of its natural and cultural resources.
- Policy 9** Promote the development of a comprehensive system of pedestrians, bicycle, equestrian, and hiking trails throughout open space lands, including arroyos, canals, in the Planning Area.
- Program 9.1** Light only those trails in natural areas that provide a reasonable alternative to transportation, or important links, between residential areas, parks, and commercial centers, as long as such lighting does not intrude upon environmentally sensitive areas or impact nearby residents.
- Program 9.2** Require developers to dedicate public-access easements for trails in private open space areas, where feasible.
- Program 9.3** Continue to coordinate with Livermore, Dublin, Sunol, and the East Bay Regional Park District to develop trails linking recreation and open space areas.
- Program 9.4** Implement the 2002 Community Trails Master Plan Update.
- Program 9.5** Retain all publicly-owned corridors – abandoned rail lines, utility corridors, water courses and canals, and other easements – for future (non-exclusive) open space and trail use.
- Program 9.6** Continue to provide different trail types for a variety of users: hikers, walkers, joggers, cyclists, and equestrians.
- Program 9.7** Protect, improve, develop, and maintain recreation and open space trails and their related facilities.

Vineyard Avenue Corridor Specific Plan

The Vineyard Avenue Corridor Specific Plan was adopted by the City in 1999 and is intended to serve as the primary land use and infrastructure regulatory guide for the development of the 384-acre Vineyard Avenue Corridor Specific Plan Area located along Vineyard Avenue in southeast Pleasanton. It establishes a unique agricultural/residential environment featuring a myriad of agricultural, residential, open space, recreational, educational, and other uses.²⁷ It is intended to establish the basic land use pattern, development and design standards, circulation network, infrastructure system, environmental measures, financing, and implementation requirements for future development.

The Vineyard Avenue Corridor Specific Plan establishes the following goals, policies, and programs related to land use that are applicable to the Housing Element Update:

²⁷ City of Pleasanton. 1999. Vineyard Avenue Corridor Specific Plan.

Fire Protection

Individual developers will be required to provide local facilities both within their projects and in the connecting streets as individual project improvements hydrants and supporting facilities will be sized to provide a minimum capacity for residential uses of 1,500 gallons per minute (2,500 gallons per minute for commercial uses) at a minimum of 20 pounds per square inch sustained for two hours. Hydrants are generally installed at 400-foot intervals.

*Pleasanton Municipal Code***Fire Safety Ordinances**

The Pleasanton Municipal Code (Municipal Code) contains three sections that bear directly on fire safety. The Building Code, Chapter 20.08, provides minimum standards for design, construction, materials, occupancy, location, and maintenance of all buildings within the city. Section 20.24.010 implements the California Fire Code on a local with certain local amendments. Fire Code, Chapter 20.24, regulates how a building is used, how machines and equipment are maintained, how hazardous materials are handled and stored, and how access to and from a site is provided. The Subdivision Ordinance, Chapter 19.36, establishes standards for roadway dimensions, subdivision layout, and public improvements needed to protect public safety. In addition, all new developments are reviewed by City departments for their potential effects on public safety, and conditions of approval are attached to minimize such effects and inspections are conducted to ensure proper installation. Developments located outside the 5-minute response time areas are required to provide additional fire mitigation measures, which include, at a minimum, automatic fire sprinkler systems.

Chapter 9.21 covers construction and demolition debris. Any project that is regulated by the city must submit a Waste Management Plan (WMP) prior to construction, demolition, or any similar construction permit. The WMP requires the applicant to disclose estimated quantities of materials that will be salvaged, recycled, or disposed, including the hauling method and facility being utilized for construction or demolition materials.

Chapter 3.22 Capital Facilities Fee

As stated in Chapter 3.22 of the Municipal Code, to provide public facilities at a rate which will accommodate expected city growth, the capital facilities fee apportions the cost of the necessary public improvements with respect to each development within the city for which a building permit or other entitlement for development is issued. The full amount of the fee is paid at the time of issuance of the building permit.

3.13.4 - Thresholds of Significance

The City is using Appendix G of the California Environmental Quality Act (CEQA) Guidelines as thresholds of significance for the Housing Element Update. To determine whether impacts related to public services and recreation are significant environmental effects, the following questions are analyzed and evaluated. Would the Housing Element Update:

. . . result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, need for new or physically altered governmental facilities, the construction of which could cause significant environmental impacts, in order

to maintain acceptable service ratios, response times or other performance objectives for any of the public services:

- a) Fire protection?
- b) Police protection?
- c) Schools?
- d) Other public facilities?
- e) Increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated?
- f) Include recreational facilities or require the construction or expansion of recreational facilities, which might have an adverse physical effect on the environment?

Approach to Analysis

This analysis identifies potential impacts to fire protection, police protection, schools, libraries, other public facilities, parks, and recreational facilities based on development anticipated from the Housing Element Update. Impacts to public services, parks, and recreational facilities were assessed using the significance criteria established by the CEQA Guidelines, as well as State, and local plans, regulations, and ordinances.

Impact Evaluation

Need for New or Altered Fire Protection Facilities

Impact PSR-1: **Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not result in substantial adverse physical impacts associated with the provision of new or physically altered fire protection facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for fire protection.**

Development consistent with the Housing Element Update could result in development on all of the potential sites for housing. Prior to development on Sites 1 (Lester) and 22 (Merritt), those sites would be annexed into Pleasanton and would continue to be served by Fire Station 2 and Fire Station 4, respectively. All potential growth would be located within the response areas for Fire Stations 1, 2, 3, 4, and 5.²⁸

Policy 10 in Chapter 5, Public Safety Element, includes a reflex time goal of 7 minutes from the time the call for service is received, 90 percent of the time. Currently, Fire Station 1, 2, 3, and 4 are meeting that reflex time goal 72 percent of the time. As of 2019, Fire Station 5 had an average reflex time of 7 minutes and 53 seconds, which does not meet the stated goal. Development and growth in the city would increase demand for fire protection services. The principal metric for the LFPD's performance is measured by its turnout time and travel time. The largest contributing factor to

²⁸ Solak, Jason. Deputy Fire Chief: Operations. Livermore-Pleasanton Fire Department. Personal communication: email. April 22, 2022.

travel time is unit availability. As the population density increases, the probability of receiving multiple calls for service increases. When a fire station receives multiple calls for service, the primary unit can only respond to a single service request at a time. This requires units from neighboring stations to respond to the additional call(s) for service, resulting in increased travel times and less unit availability. The impact to the community is additional delayed responses to fire and EMS service calls.²⁹ Therefore, as the demand for fire protection services increases, there may be a need to increase staffing and equipment to maintain acceptable service ratios, reflex times, and other performance standards. However, this would require existing fire stations to be able to accommodate the additional staff and/or equipment. If an existing fire station is at capacity for staffing, this could require an expansion of an existing fire station or construction of a new fire station, the construction of which could cause environmental impacts.

The General Plan includes policies and programs to ensure that fire protection services keep pace with new development. Program 2.1 of Policy 2 of Goal 3 in Chapter 6, Public Facilities and Community Programs Element requires development to pay its fair share of costs related to the purchasing of sites and financing of improvements for existing and future municipal facilities, including fire stations. Program 8.2 in Chapter 5, Public Safety Element, requires new development to pay for fire safety improvement generated by that new development. Programs 10.1 and 10.3 requires the denial of a proposed development not within a 5-minute travel time of a fire station unless acceptable mitigations are provided and the evaluation of expanded services or facilities as the city grows. There are also policies and programs that would reduce the calls for service by requiring new developments to include necessary water facilities (Program 11.1) and for developments to be provided with sufficient fire-flow facilities (Program 11.2). Other policies and programs would reduce the fire threat to structures and occupants by requiring compliance with fire and building codes, including the installation of fire-detection and sprinkler protection (Policies 12 and 13 and Programs 12.1, 13.1, 13.2, 13.3, and 13.4). Policy 13 also requires development outside the 5-minute travel time and in Special Fire Protection Areas to provide effective fire prevention measures. According to Figure 5-6 of the General Plan, Sites 1 (Lester), 22 (Merritt), and 27 (PUSD-Vineyard) are located in Special Fire Protection Areas and would therefore abide by Policy 13, requiring development to provide effective fire prevention measures including, but not limited to, the installation of building and fire code compliant fire-detection and alarm equipment (Program 13.1); installation of fire sprinkler protection (Program 13.2); installation of automatic fire sprinkler systems in new construction (Program 13.3); and the provision of adequate fire equipment access (Program 13.4). Program 13.6 would require development to incorporate wildland interface mitigation measure such as greenbelts, defensible space around structures, and other preventive measures (Program 13.6) and landscaping with fire resistant plant material; compliance with these programs would be confirmed during project approval. The Vineyard Avenue Corridor Specific Plan includes certain provisions with respect to sizing of hydrants, and development on Site 27 (PUSD-Vineyard) would comply with these provisions.

The Municipal Code contains rules and regulations related to fire protection services and payment of public service fees. Chapter 3.22 of the Municipal Code requires that development projects pay capital facilities fee apportioned to the cost of the necessary public improvements associated with

²⁹ Solak, Jason. Deputy Fire Chief: Operations. Livermore-Pleasanton Fire Department. Personal communication: email. April 22, 2022.

each development within the city. Chapter 20.24 of the Municipal Code implements the California Fire Code on a local level. In accordance with Chapter 20.24, new development projects must meet fire protection and emergency access requirements. In addition, new development projects are required to install fire sprinklers, fire alarms, and fire extinguishers that are up to current code and appropriately located within proposed buildings or structures.

As noted by the LPFD, without project-specific information on size and scope of development projects consistent with the Housing Element Update, the LPFD is unable to provide recommendations to minimize impacts to fire and EMS response.³⁰ The project-specific environmental impacts of constructing new or expanded fire protection facilities to support the growth anticipated as part of the Housing Element Update cannot be determined at this time because the designs of future new or expanded facilities are not known. It can be expected that construction and operation of future new or expanded fire protection facilities would have similar impacts as would construction and operation of other types of new development consistent with the Housing Element Update. As the construction of new or expanded fire protection facilities proceed, those projects will be reviewed by the City for compliance with the policies and actions of the General Plan and the Municipal Code.

Furthermore, as the City receives development applications for subsequent development consistent with the Housing Element Update, those applications will be reviewed by the City for compliance with the policies and programs of the General Plan, and Vineyard Avenue Corridor Specific Plan to ensure that fire protection services keep pace with new development. In addition, the Municipal Code, which implements the General Plan would be reviewed when development applications are received, including Chapter 3.22, Capital Facilities Fee, and Chapter 20.24, California Fire Code. Through implementation of the capital facilities fee, developers would be responsible for payment of any improvements needed, including the need for new facilities, which would effectively mitigate any increased demand for services associated with development consistent with the Housing Element Update. Therefore, future development consistent with the Housing Element Update would not result in significant adverse effects related to fire protection services and impacts would be less than significant.

Level of Significance

Less than significant impact.

Need for New or Altered Police Protection Facilities

Impact PSR-2:	Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not result in substantial adverse physical impacts associated with the provision of new or physically altered police protection facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for police protection.
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Development consistent with the Housing Element Update could result in additional development on all of the potential sites for housing. Prior to development on Sites 1 (Lester) and 22 (Merritt),

³⁰ Solak, Jason. Deputy Fire Chief: Operations. Livermore-Pleasanton Fire Department. Personal communication: email. April 22, 2022.

those sites would be annexed into Pleasanton and would be served by police services within Pleasanton.

Policy 27 in Chapter 5, Public Safety Element, includes a response time goal of 4 minutes for emergency calls and 16 minutes for general service calls. Currently the Pleasanton Police Department maintains a response time of 4:19 minutes for emergency calls and 20:15 for non-emergency calls. Development and growth in the city would increase demand for police protection services. Growth on the outer limits of the city and outside of the city limits, such as on Sites 1 (Lester) and 22 (Merritt), could significantly increase driving time and distance for officers responding to both emergency and non-emergency calls for service. As the demand for police services increases, there may be a need to increase staffing and equipment, including the development of additional police substations, to maintain acceptable service ratios, response times, and other performance standards.³¹ However, this would require existing police stations to be able to accommodate the additional staff and/or equipment. If an existing police station is at capacity for staffing, this could require an expansion of an existing police station or construction of a new police substation, the construction of which could cause environmental impacts.

The General Plan includes policies and programs to ensure that police protection services keep pace with new development. Program 2.1 of Policy 2 of Goal 3 in Chapter 6, Public Facilities and Community Programs Element, requires development to pay its fair share of costs related to the purchasing of sites and financing of improvements for existing and future municipal facilities. Program 26.2 of Policy 26, of Goal 8 in Chapter 5, Public Safety Element, requires new development to pay for police safety improvements required of that new development. There are also policies and programs that would reduce calls for police service through the provision of “Crime Prevention Through Environmental Design” that would incorporate crime reduction and public safety response features in the design and planning of private and public development (Policy 29 and Program 29.1). In addition, all development requiring a discretionary use permit would be submitted and reviewed by the Police Department, which would allow the Police Department an opportunity to provide recommendations that would reduce impacts on police services (Program 29.2).

The Municipal Code contains rules and regulations related to police services and payment of public service fees. Chapter 3.22 of the Municipal Code requires that development projects pay capital facilities fee apportioned to the cost of the necessary public improvements associated with each development within the city.

The project-specific environmental impacts of constructing new or expanded police protection facilities to support the growth anticipated as part of the Housing Element Update cannot be determined at this time because the designs of future new or expanded facilities are not known. It can be expected that construction and operation of future new or expanded police protection facilities would have similar impacts as would construction and operation of other types of new development consistent with the Housing Element Update. As the construction of new or expanded police protection facilities proceeds, those projects will be reviewed by the City for compliance with the policies and programs of the General Plan and the Municipal Code. General Plan goals and

³¹ Cox, Larry. Captain. Pleasanton Police Department. Personal communication: email: June 2, 2022.

policies reduce impacts associated with police protection facilities. For example, Program 26.2 requires new development to pay for police safety improvements specific for that development. Additionally, Policy 29 encourages the community to seek ways to reduce police service demands through the contemporary practice of “Crime Prevention Through Environmental Design.” This requires the incorporation of crime reduction and public safety response features in the design and planning of private and public development. Furthermore, as the City receives development applications for subsequent development consistent with the Housing Element Update, those applications would be reviewed by the City for compliance with the policies and programs of the General Plan to ensure that police protection services keep pace with new development (Program 29.2). In addition, the Municipal Code, which implements the General Plan would be reviewed when development applications are received, including Chapter 3.22, Capital Facilities Fee. Specifically, the capital facilities fee would fund the purchase of police station sites, the construction of new stations, and the funding of certain capital equipment. As new development occurs, fees will be collected to ensure adequate levels of service for police protection are maintained. Through implementation of the capital facilities fee, developers would be responsible for any improvements needed for police protection services, which would effectively mitigate any increased demand for services associated with development consistent with the Housing Element Update. Therefore, future development consistent with the Housing Element Update would not result in significant adverse effects related to police protection services and impacts would be less than significant.

Level of Significance

Less than significant impact.

Need for New or Altered School Facilities

Impact PSR-3: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not result in substantial adverse physical impacts associated with the provision of new or physically altered school facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios or other performance objectives for schools.

Development consistent with the Housing Element Update could result in development on all of the potential sites for housing. Exhibit 3-13.2 depicts the potential sites for rezoning in relation to the existing schools. Prior to development on Sites 1 (Lester) and 22 (Merritt), those sites would be annexed into Pleasanton and would be served by school facilities within the PUSD.

An estimate of future student generation associated with the development of all of the potential sites for rezoning is based on the likely unit types for each of the sites, and the associated Student Yield Factors used by PUSD for Grades K-5, 6-8 and 9-12 for 2022. These factors were used by PUSD in its most recent 7-Year Population Projections, published in January 2022.³² Different factors are assigned by PUSD for Single Family Dwellings (SFD); Multi-Family Attached (MFA), which includes

³² Pleasanton Unified School District (PUSD). 7-Year Student Population Projections by Residence, Fall 2022-2028 (Based on Fall 2021 Data). January 25. Website: <https://4.files.edl.io/99c1/03/02/22/060726-fd82aca3-7a71-4407-bcd9-17615edcf006.pdf>. Accessed August 23, 2022.

units such as condominiums and townhomes; Apartments (APT); and Transit-Oriented Development (TOD), which includes high density housing types built in proximity to transit.

As shown in Table 3.13-9 if all the sites were to develop at their maximum density, a total of approximately 2,532 K-12 students could be generated, including approximately 1,379 students in Grades K-5, approximately 598 students in Grades 6-8, and approximately 557 students in Grades 9-12.

Table 3.13-9: Student Generation Associated with Development Consistent with Housing Element Update

Site	Name	PUSD Site Type	Grade K-5	Grade 6-8	Grade 9-12
1	Lester	SFD	11.72	5.084	5.363
2	Stoneridge Shopping Center, Mall	TOD	162.72	48.96	70.56
3	Donlon	SFD	10.58	4.592	4.844
4	Owens (Motel 6 and Tommy T)	TOD	10.62	3.196	4.61
5	Laborer Council	TOD	6.10	1.836	2.65
6	Signature Center	TOD	49.72	14.96	21.56
7	Hacienda Terrace	TOD	9.04	2.72	3.92
8	Muslim Community Center	MFA	49.25	26.625	14.63
9	Metro 580	TOD	42.38	12.75	18.38
11	Old Santa Rita Area	TOD	146.45	44.574	63.50
12	Pimlico Area (North side)	TOD	9.61	2.89	4.17
14	St. Elizabeth Seton	MFA	20.094	10.863	5.97
15	Rheem Drive Area (southwest side)	MFA	53.978	29.181	16.03
16	Tri-Valley Inn	MFA	24.428	13.206	7.25
18	Valley Plaza	MFA	86.68	46.86	25.74
19	Black Avenue	MFA	25.61	13.845	7.61
20	Boulder Court	APT	49.52	27.59	22.68
21a	Kiewit (low/medium density)	APT	26.20	14.60	12.00
21b	Kiewit (high density)	SFD	211.68	91.84	96.88
22	Merritt	SFD	34.02	14.924	15.57
23	Sunol Boulevard	APT	125.24	69.79	57.36
24	Sonoma Drive Area	MFA	64.222	34.719	19.07
25	PUSD-District	MFA	64.222	34.719	19.07
26	St. Augustine	SFD	10.96	4.756	5.017
27	PUSD-Vineyard	SFD	9.45	4.1	4.325

Site	Name	PUSD Site Type	Grade K-5	Grade 6-8	Grade 9-12
29	Oracle	TOD	29.61	7.65	12.84
—	Dublin-Pleasanton BART Station Property	TOD	34.57	10.404	14.99
Total			1,377	598	557

Notes:

APT = Apartment units (non-TODs)
MFS = Multi-Family Attached units (i.e.: Condominiums, townhomes)
SFD = Single Family Detached units
TOD = Transit Oriented Development

Generation Rates:

SFD, Grade K-5: 0.378, Grade 6-8: 0.164, Grade 9-12: 0.173
MFA, Grade K-5: 0.394, Grade 6-8: 0.213, Grade 9-12: 0.117
TOD, Grade K-5: 0.113, Grade 6-8: 0.034, Grade 9-12: 0.049
APT, Grade K-5: 0.131, Grade 6-8: 0.073, Grade 9-12: 0.06

Totals are rounded up to nearest student.

Sources: Pleasanton Unified School District. 2022. 7-Year Student Population Projections by Residence: Fall 2022-2028 (Based on Fall 2021 Data). January 25.

A representative from PUSD noted that new students associated with development consistent with the Housing Element Update could require the need to build additional capacity or new schools to accommodate growth. Elementary schools in the northern area of PUSD (Donlon and Fairlands) are currently impacted, and any further housing would require students to be assigned to another campus. A PUSD representative noted that the current level of developer fees set by State law is not sufficient to cover the full cost of facility impacts associated with additional housing.³³

The General Plan includes policies and programs to ensure that school facilities keep pace with new development. Program 7.2 of Policy 7 in Chapter 6, Public Facilities and Community Programs Element, of the General Plan provides acceptable enrollment sizes for elementary, middle, and high schools, and Policy 8 requires the City to coordinate with PUSD to maintain elementary schools within student walking distance where feasible. Program 2.1 of Policy 2 of Goal 3 in Chapter 6, Public Facilities and Community Programs Element, requires development to pay its fair share of costs related to the purchasing of sites and financing of improvements for existing and future municipal facilities, including schools. Notwithstanding these General Plan policies and programs, while State law encourages coordination between cities and school districts related to planning for school siting, state law is also clear that long range master planning for school sites is ultimately the responsibility of the school district (see Cal. Government Code section 65352.2). Section 65995(h) of the California Government Code (SB 50), clarifies that the payment of statutory fees “. . . is deemed to be full and complete mitigation of the impacts of any legislative or adjudicative act, or both, involving, but not limited to, the planning, use, or development of real property.”

³³ Sheikholeslami, Ahmad. Assistant Superintendent, Pleasanton Unified School District (PUSD). Personal communication: email. April 13, 2022.

As part of its efforts to anticipate and appropriately plan for future growth, PUSD prepares a 7 year projection of student population, updated annually, which looks at planned and proposed development within its enrollment boundaries, as well as demographic shifts, and “mobility factors” such as inter-district and inter-school transfers which over time affect overall enrollment. It is noted that the most recent study, which takes into account approximately 2,983 units of new residential development in Pleasanton (including at least some sites that are part of the Housing Element Update), projects modest increases in elementary school enrollment, and relatively flat or declining enrollment in middle school or high school enrollments.³⁴ Ongoing updates to these forecasts, and similar planning will be used by the PUSD to appropriately plan for new facilities over time.

Depending on other future enrollment trends, modifications to attendance area maps may be undertaken by PUSD. New student population could also have the potential to cause the need for new or expanded school facilities. As the demand for school services increases from development consistent with the Housing Element Update, there may be a need to increase staffing, facilities, and equipment to maintain acceptable service ratios and other performance objectives for schools. However, this would require existing school sites to be able to accommodate the additional staff, facilities and/or equipment. If an existing school site is at capacity for staffing or for students, this could require an expansion of an existing school site or construction of a new school site, the construction of which could cause environmental impacts.

The project-specific environmental impacts of constructing new or expanded school facilities to support the growth anticipated as part of the Housing Element Update cannot be determined at this time because the site-specific locations and designs of future new or expanded facilities are not known.^{35,36} It can be expected that construction and operation of future new or expanded school facilities would have similar impacts as would construction and operation of other types of new development under the Housing Element Update. Further, PUSD would be required to receive approval from the Division of the State Architect and complete any required CEQA review for construction of new or expanded school facilities.

As noted above, the payment of statutory fees “. . . is deemed to be full and complete mitigation of the impacts of any legislative or adjudicative act, or both, involving, but not limited to, the planning, use, or development of real property... on the provision of adequate school facilities.” Therefore, with the payment of required state established SB 50 fees, future development consistent with the Housing Element Update would not result in significant adverse effects related to school facilities and impacts would be less than significant.

Level of Significance

Less than significant impact.

³⁴ Pleasanton Unified School District (PUSD). 7-Year Student Population Projections by Residence, Fall 2022-2028 (Based on Fall 2021 Data). January 25. Website: <https://4.files.edl.io/99c1/03/02/22/060726-fd82aca3-7a71-4407-bcd9-17615edcf006.pdf>. Accessed August 23, 2022.

³⁵

³⁶ Pleasanton Unified School District (PUSD). 2022. Response to Community Concerns on Sites Inventory List. February 7.

Need for New or Altered Library Facilities

Impact PSR-4: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not result in substantial adverse physical impacts associated with the provision of new or physically altered library facilities, need for new or physically altered library facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios or other performance objectives for library facilities.

Development consistent with the Housing Element Update could result in development on all of the potential sites for housing. Prior to development on Sites 1 (Lester) and 22 (Merritt), those sites would be annexed into Pleasanton and would be served by library facilities within Pleasanton.

The Pleasanton Public Library maintains a 30,178-square-foot library facility, which equates to approximately 0.377 square feet of library space per capita. The Pleasanton Library Space Needs Assessment recommends a 0.91 per capita of building space,³⁷ which equates to a minimum of approximately 90,000 square feet of facility space to accommodate the population growth associated with the Housing Element Update. The Pleasanton Public Library maintains a physical collection size of 163,325, resulting in a current ratio between the materials collection and current population of approximately 2:1. To maintain this ratio, the physical collection would need to increase to almost 200,000 items. The number of cardholders would also increase from 54,730 registered cardholders to a little over 66,000 cardholders (assuming the current cardholder percentage of 67 percent remains steady).³⁸ A representative for the Pleasanton Public Library noted the following potential concerns and challenges related to accommodating the population growth anticipated with the Housing Element Update: the building size and parking are already limited, community access to popular programs could be impacted, the 200,000 necessary items to accommodate demand would not fit in the current facility, additional funds are needed to meet increased demand for books and materials, and a lack of staffing to meet future demand.³⁹ As noted by the representative, there would be additional staffing, equipment, and facility space needed to maintain acceptable service ratios and other performance objectives for library facilities, which could require an upgrade of an existing library or construction of a new library, the construction of which could cause environmental impacts. The representative noted the additional staffing, equipment, and facility space could be accommodated by a new library envisioned as part of the Pleasanton Civic Center Library Master Plan⁴⁰ or with the completion of a satellite branch. However, at this time, no specific plans have been approved and any development associated with expanded library facilities as part of the Pleasanton Civic Center Library Master Plan⁴¹ is too speculative to evaluate as part of the analysis within this Program EIR. Library and Recreation staff is currently in the planning stages of a mobile vehicle to help expand library and recreation services with an anticipated in-service date by spring 2024.

³⁷ Kathryn Page and Associates. 2004 (updated 2009). Pleasanton Library Space Needs Assessment.

³⁸ Kathryn Page and Associates. 2004 (updated 2009). Pleasanton Library Space Needs Assessment.

³⁹ Ibid.

⁴⁰ City of Pleasanton. 2016. Pleasanton Civic Center/Library Master Plan. Website: <http://www.cityofpleasantonca.gov/civicax/filebank/blobdload.aspx?BlobID=34561>. Accessed May 3, 2022.

⁴¹ City of Pleasanton. 2016. Pleasanton Civic Center/Library Master Plan. Website: <http://www.cityofpleasantonca.gov/civicax/filebank/blobdload.aspx?BlobID=34561>. Accessed May 3, 2022.

The General Plan includes policies and programs to ensure that library facilities keep pace with new development. Program 2.1 of Policy 2 of Goal 3 in Chapter 6, Public Facilities and Community Programs Element, requires development to pay its fair share of costs related to the purchasing of sites and financing of improvements for existing and future municipal facilities, including library facilities. Policy 9 requires the provision of sufficient sites and improvements for a full range of library facilities to serve existing and future development. Programs 9.3 and 9.4 recommend the City explore the expansion of Pleasanton Public Library services included reviewing various locations for an expanded library.

The Municipal Code contains rules and regulations related to payment of public service fees, which includes libraries. Chapter 3.22 of the Municipal Code requires that development projects pay capital facilities fee apportioned to the cost of the necessary public improvements associated with each development within the city. While there is no portion of the capital facilities fee automatically earmarked for the provision of library services, the City, in its discretion, can direct a portion of the capital facilities fee to library facilities. The Pleasanton Development Impact Fee Nexus Study⁴² assumes a new library facility to be developed as part of the Civic Center Master. However, as stated above, no plans have been approved at this time.

As described above, the project-specific environmental impacts of constructing new or expanded library facilities to support the growth associated with the Housing Element Update cannot be determined at this time because the site-specific locations and designs of future new or expanded facilities are not known. As the City proceeds with the construction of new or expanded library facilities, those projects would be reviewed by the City for compliance with the policies and programs of the General Plan and Municipal Code.

Furthermore, as the City receives development applications for subsequent development consistent with the Housing Element Update, those applications would be reviewed by the City for compliance with the policies and programs of the General Plan to ensure that library facilities keep pace with new development. In addition, development consistent with the Housing Element Update would be required to pay capital facility fees in accordance with Chapter 3.22. Therefore, future development consistent with the Housing Element Update would not result in significant adverse effects related to library facilities and impacts would be less than significant.

Level of Significance

Less than significant impact.

⁴² City of Pleasanton. 2018. Pleasanton Development Impact Fee Nexus Study. September 24. Website: <https://www.cityofpleasantonca.gov/civicax/filebank/blobdload.aspx?BlobID=34260>. Accessed August 29, 2022.

Need for New or Altered Other Public Facilities

Impact PSR-5: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not result in substantial adverse physical impacts associated with the provision of new or physically altered other public facilities, need for new or physically altered other public facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios or other performance objectives for other public facilities.

Development consistent with the Housing Element Update could result in development on all of the potential sites for housing. Prior to development on Sites 1 (Lester) and 22 (Merritt), those sites would be annexed into Pleasanton and would be served by other public facilities within Pleasanton.

Development and growth in the city would increase demand for other public facilities. As demand for other public facilities increases from development consistent with the Housing Element Update, there may be an additional need to increase staffing and equipment to maintain acceptable service ratios and other performance objectives for these other public facilities. However, this would require existing public facilities to be able to accommodate the additional staff and/or equipment. If an existing public facility is at capacity for staffing, this could require an expansion of an existing public facility or construction of a new public facility, the construction of which could cause environmental impacts.

The General Plan includes policies and programs to ensure that public facilities keep pace with new development. Program 2.1 of Policy 2 of Goal 3 in Chapter 6, Public Facilities and Community Programs Element, requires development to pay its fair share of costs related to the purchasing of sites and financing of improvements for existing and future municipal facilities, including public facilities such as city hall and cultural arts centers. Policy 18 of Goal 8 in Chapter 6, Public Facilities and Community Programs Element, requires the City to provide additional public facilities to enhance the community and Policy 22 requires the City to facilitate provision of safe, affordable, and high quality child-care facilities and services to families.

The project-specific environmental impacts of constructing new or expanded other public facilities to support the growth associated with the Housing Element Update cannot be determined at this time because the site-specific locations and designs of future new or expanded facilities are not known. As the City proceeds with the construction of new or expanded library facilities, those projects would be reviewed by the City for compliance with the policies and programs of the General Plan and Municipal Code. Furthermore, as the City receives development applications for subsequent development consistent with the Housing Element Update, those applications will be reviewed by the City for compliance with the policies and programs of the General Plan to ensure that other facilities keep pace with new development. In addition, development consistent with the Housing Element Update would be required to pay capital facilities fees in accordance with Chapter 3.22 of the Municipal Code.

Therefore, the physical effects on the environment from the construction of new or expanded public facilities would be less than significant, and future development consistent with the Housing

Element Update would not result in significant adverse effects related to other public facilities and impacts would be less than significant.

Level of Significance

Less than significant impact.

Effects of Increased Use of Parks

Impact PSR-6: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated.

Development consistent with the Housing Element Update could result in development on all of the potential sites for housing. As described in Chapter 2, Project Description, to present a conservative analysis of potential environmental impacts, this Draft Program EIR assumes a total of 7,787 units and a maximum of 18,029 residents. As of January 2021, the city had a population of 78,371. Therefore, assuming maximum buildout of the potential sites for rezoning, construction of 93 ADUs, and a density of 75 dwelling unit/acre (du/acre) for the Dublin-Pleasanton BART station property, a conservative population estimate by 2031 is 96,400 residents.

The City conducted an analysis of the suitability of the various proposed housing sites to identify locations that would meet certain criteria (see Chapter 2, Project Description), including placement of housing near neighborhood conveniences to enhance livability. These neighborhood conveniences include parks, recreational facilities, and open space. The locations of potential sites for rezoning in relation to existing parks and recreational facilities are shown in Exhibit 3.13-3. As shown in Exhibit 3.13-3, many of the proposed sites are within 0.5 mile, walking distance, of a neighborhood or community park, which provides greater accessibility and is a goal of the General Plan as mentioned in Program 10.8 of Policy 10 of Chapter 6, Public Facilities and Community Programs Element, of the General Plan, above.

The City has 46 developed park sites that total 385 acres,⁴³ which is approximately 5.9 acres per 1,000 residents (based on a population of 78,371 as of January 1, 2021).⁴⁴ The City has 1,016 acres of open space,⁴⁵ which also contain trails for recreation use, which is approximately 13 acres per 1,000 resident (based on a population of 78,371 as of January 1, 2021).⁴⁶ Therefore, the City maintains a park service standard of over 5 acres of all park and open space types per 1,000 residents, consistent with Program 10.8. Based on the City's projected population of 96,400 by 2031, an additional approximately 100 acres of neighborhood parkland would be needed by 2031 to achieve the service standard of 5 acres of parkland per 1,000 residents; with the projected population of 96,400, the City would maintain an open space ratio of 10.5 per 1,000 residents, which would be well above the target ratio.

⁴³ Crose, Michele. Assistant Director, Pleasanton Parks Department. Personal communication: email. April 14, 2022.

⁴⁴ California Department of Finance. 2021. Table 2: E-5 City/County Population and Housing Estimates. January 1.

⁴⁵ Crose, Michele. Assistant Director, Pleasanton Parks Department. Personal communication: email. April 14, 2022.

⁴⁶ California Department of Finance. 2021. Table 2: E-5 City/County Population and Housing Estimates. January 1.

Development and growth in the city would increase demand for existing parks and recreational facilities. As the demand for parks and recreational facilities increases, there may be a need to increase staffing and other resources to maintain existing parks and recreational facilities from their increased use. Additionally, as the demand for parks and recreational facilities increases, there may be a need to expand existing parks and recreational facilities or construct new parks and recreational facilities to maintain acceptable service ratios. The environmental impacts from the construction of new parks and recreational facilities are discussed under Impact PSR-7.

The General Plan policies and programs would ensure that parks and recreational facilities keep pace with new development. Program 10.2 of Goal 6 of Chapter 6, Public Facilities and Community Program Element, encourages developers to dedicate public park acreage in areas designated for park use on the General Plan map rather than contribute in-lieu fees. This would help facilitate the construction of parks in areas designated by the City, which would reduce the possibility an influx of users at existing parks. Several programs (10.3, 10.4, 10.8) would require the siting of parks throughout the city, especially in areas near residences, which would also ensure new residents have access to parks, stopping the over usage of existing parks and recreational facilities.

The Municipal Code contains rules and regulations related to payment of capital facilities fees, which includes parks and recreation facilities. Chapter 3.22 of the Municipal Code requires that development projects pay capital facilities fee apportioned to the cost of the necessary public improvements associated with each development within the city. Further, the specific purpose of the capital facilities fee is to mitigate the impact of development projects on public facilities, including park and recreation facilities, by collecting sufficient funds to construct adequate park facilities and improvements in the city and to refurbish and expand existing facilities to maintain existing levels of service.

As the City receives development applications for subsequent development consistent with the Housing Element Update, those applications will be reviewed by the City for compliance with the policies and program of the General Plan to ensure that parks and recreational facilities keep pace with new development. In addition, development consistent with the Housing Element Update would be required to pay the capital facilities fee in accordance with Chapter 3.22 of the Municipal Code. Therefore, future development consistent with the Housing Element Update would not result in significant adverse effects related to parks and recreational facilities and impacts would be less than significant.

Level of Significance

Less than significant impact.

Effects from Provision of Parks or Recreational Facilities

Impact PSR-7:	Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not include recreational facilities or require the construction or expansion of recreational facilities which might have an adverse physical effect on the environment.
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As described in Impact PSR-6, as the demand for parks and recreational facilities increases, there may be a need to expand existing parks and recreational facilities or construct new parks and recreational facilities to maintain acceptable service ratios. There could be environmental impacts associated with the construction of new or expanded parks and recreational facilities.

The project-specific environmental impacts of constructing new or expanded parks and recreational facilities to support the growth associated with the Housing Element Update cannot be determined at this time because the designs of future new or expanded facilities are not known. As the construction of new or expanded parks and recreational facilities proceeds, those projects will be reviewed by the City for compliance with the policies and programs of the General Plan and the Municipal Code. Therefore, the physical effects on the environment from the construction of new or expanded parks and recreational facilities would be less than significant.

Level of Significance

Less than significant impact.

3.13.5 - Cumulative Impacts

The geographic scope of the cumulative impact analysis for land use and planning is the Tri-Valley Planning Area and is delineated by the local service areas. This analysis evaluates whether the impacts of the Housing Element Update, together with the impacts of cumulative development, could result in a cumulatively significant impact to public services. This analysis then considers whether incremental contribution to cumulative impacts associated with the implementation of the Housing Element Update would be significant. Both conditions must be fulfilled for a project's cumulative effects to rise to a level of significance.

Fire Protection Facilities

The geographic context for the analysis of cumulative impacts related to fire protection facilities includes the LFPD service area, which comprises the Cities of Pleasanton and Livermore. A significant cumulative environmental impact would result if cumulative growth exceeded the ability of LFPD to adequately serve its service area, thereby requiring construction of new facilities or modification of existing facilities. All cumulative projects within the LFPD service area would be required to comply with City ordinances and General Plan policies and programs that address fire protection services, including payment of a capital facilities fee to provide funding for adequate fire equipment, vehicles, and facilities to meet the broad range of needs of residents and employees served by LFPD. Because past⁴⁷ and present development will comply with all ordinances and policies, and there are mechanisms in place to ensure provision of adequate service, there would be no significant cumulative impact with respect to fire protection services. Therefore, cumulative impacts would be less than significant.

Moreover, development associated with the Housing Element Update would have a less than significant incremental contribution (see Impact PSR-1) to the less than significant cumulative impacts and would not be cumulatively considerable. As previously discussed, development

⁴⁷ Prior development activity provided revenue through payment of impact fees and license and permit fees. Additionally, LFPD conducts a regular budgeting process where future facility and staff needs are identified.

consistent with the Housing Element Update would be required to comply with the policies and actions in the General Plan, as well as the Municipal Code, to ensure that fire protection services are adequate as future development is proposed. Therefore, impacts of development consistent with the Housing Element Update on fire protection services are not cumulatively considerable and the cumulative impact would be less than significant.

Police Protection Facilities

The geographic context for the analysis of cumulative impacts related to police protection facilities includes the Pleasanton Police Department service area, which comprises the City of Pleasanton. A significant cumulative environmental impact would result if this cumulative growth exceeded the ability of the Pleasanton Police Department to adequately serve their service area, thereby requiring construction of new facilities or modification of existing facilities. All cumulative projects within the Pleasanton Police Department's service area would be required to comply with City ordinances and General Plan policies and programs that address police protection services, including payment of a capital facilities fee to provide funding for adequate police equipment, vehicles, and facilities to meet the broad range of needs of residents. Therefore, cumulative impacts would be less than significant.

Moreover, development associated with the Housing Element Update would have a less than significant incremental contribution (see Impact PSR-2) to the less than significant cumulative impacts and would not be cumulatively considerable.

As previously discussed, development consistent with the Housing Element Update would be required to comply with the policies and actions in the General Plan, as well as the Municipal Code, to ensure that police protection services are adequate as future development is proposed. Therefore, impacts of development consistent with the Housing Element Update on police protection services are not cumulatively considerable and the cumulative impact would be less than significant.

School Facilities

The geographic context for the analysis of cumulative impacts related to school facilities includes the PUSD district boundaries, which are provided in Exhibit 3.13-2. Regional growth resulting from past, present, and reasonably foreseeable projects would result in increased demand for additional school facilities within the PUSD. Like development in Pleasanton, the schools are expected to receive school impact fees from cumulative development within other jurisdictions, as applicable. The payment of school impact fees, per SB 50, would ensure that school facilities can accommodate future students. Therefore, cumulative impacts would be less than significant.

Moreover, development associated with the Housing Element Update's less than significant incremental contribution to the less than significant cumulative impacts would not be cumulatively considerable. As discussed under Impact PSR-3, development consistent with the Housing Element Update would be required to pay the school impact fees adopted by PUSD, per SB 50, and this requirement is considered to fully address the impacts of development consistent with the Housing Element Update on school facilities. Therefore, impacts development consistent with the Housing

Element Update on school facilities are not cumulatively considerable and the cumulative impact would be less than significant.

Library Facilities

The geographic context for analysis of cumulative impacts to library facilities includes Pleasanton residents who use Pleasanton Public Library. A significant cumulative environmental impact would result if cumulative growth exceeded the ability of the Pleasanton Public Library to adequately serve people within their service area, thereby requiring construction of new facilities or modification of existing facilities. All cumulative projects would be required to comply with City ordinances and other policies that address library facilities and services, including payment of the capital facilities fee. Therefore, cumulative impacts would be less than significant.

Moreover, development associated with the Housing Element Update's less than significant incremental contribution to the less than significant cumulative impacts would not be cumulatively considerable. As discussed under Impact PSR-4, development consistent with the Housing Element Update would be required to pay the capital facilities fee. Therefore, impacts associated with development consistent with the Housing Element on library facilities are not cumulatively considerable and the cumulative impact would be less than significant.

Other Public Facilities

The geographic context for analysis of cumulative impacts to other public facilities includes the city limits. Development and growth in the city would increase demand for other public facilities. A significant cumulative environmental impact would result if cumulative growth exceeded the ability of the City to adequately serve people within their service area, thereby requiring construction of new facilities or modification of existing facilities. All cumulative projects would be required to comply with City ordinances and other policies that address other public facilities. Therefore, cumulative impacts would be less than significant.

Moreover, development associated with the Housing Element Update's less than significant incremental contribution to the less than significant cumulative impacts would not be cumulatively considerable. As discussed under Impact PSR-5, development consistent with the Housing Element Update would not create a need for new or physically altered other public facilities to maintain acceptable service ratios or other performance objectives. Therefore, impacts associated with development consistent with the Housing Element on other public facilities are not cumulatively considerable and the cumulative impact would be less than significant.

Park and Recreational Facilities

The geographic context for the analysis of cumulative impacts of parks and recreational facilities includes the city limits. A significant cumulative environmental impact would result if this cumulative growth resulted in an increase in the use of existing parks and recreational facilities such that substantial physical deterioration of the parks or recreational facilities would occur, or be accelerated, to require the construction of new parks and recreational facilities or modification of existing parks and recreational facilities. All cumulative projects would be required to comply with City ordinances and General Plan policies and programs that address parks and recreational facilities,

such as paying capital facilities fees and dedicating public park acreage in areas designated for park use on the General Plan map. Therefore, cumulative impacts to parks and recreational facilities would be less than significant.

Moreover, development associated with the Housing Element Update's less than significant incremental contribution to less than significant cumulative impacts would not be cumulatively considerable. As discussed under Impact PSR-6, development consistent with the Housing Element would not increase the use of existing neighborhood and regional parks or other recreational facilities, such that substantial physical deterioration of the facility would occur or be accelerated. As discussed under Impact PSR-7, the construction or expansion of parks and other recreational facilities are not expected to result in an adverse physical effect on the environment. As such, development consistent with the Housing Element Update would not create substantial impacts related to parks and other recreational facilities.

Further, potential future impacts to Pleasanton parks and recreational facilities would be further reduced through the contribution of the capital facilities fee to ensure facilities at these locations are adequately maintained and sufficient to accommodate growth associated with cumulative development. Therefore, impacts associated with development consistent with the Housing Element on parks and other recreational facilities are not cumulatively considerable and the cumulative impact would be less than significant.

Level of Cumulative Significance

Less than significant impact.

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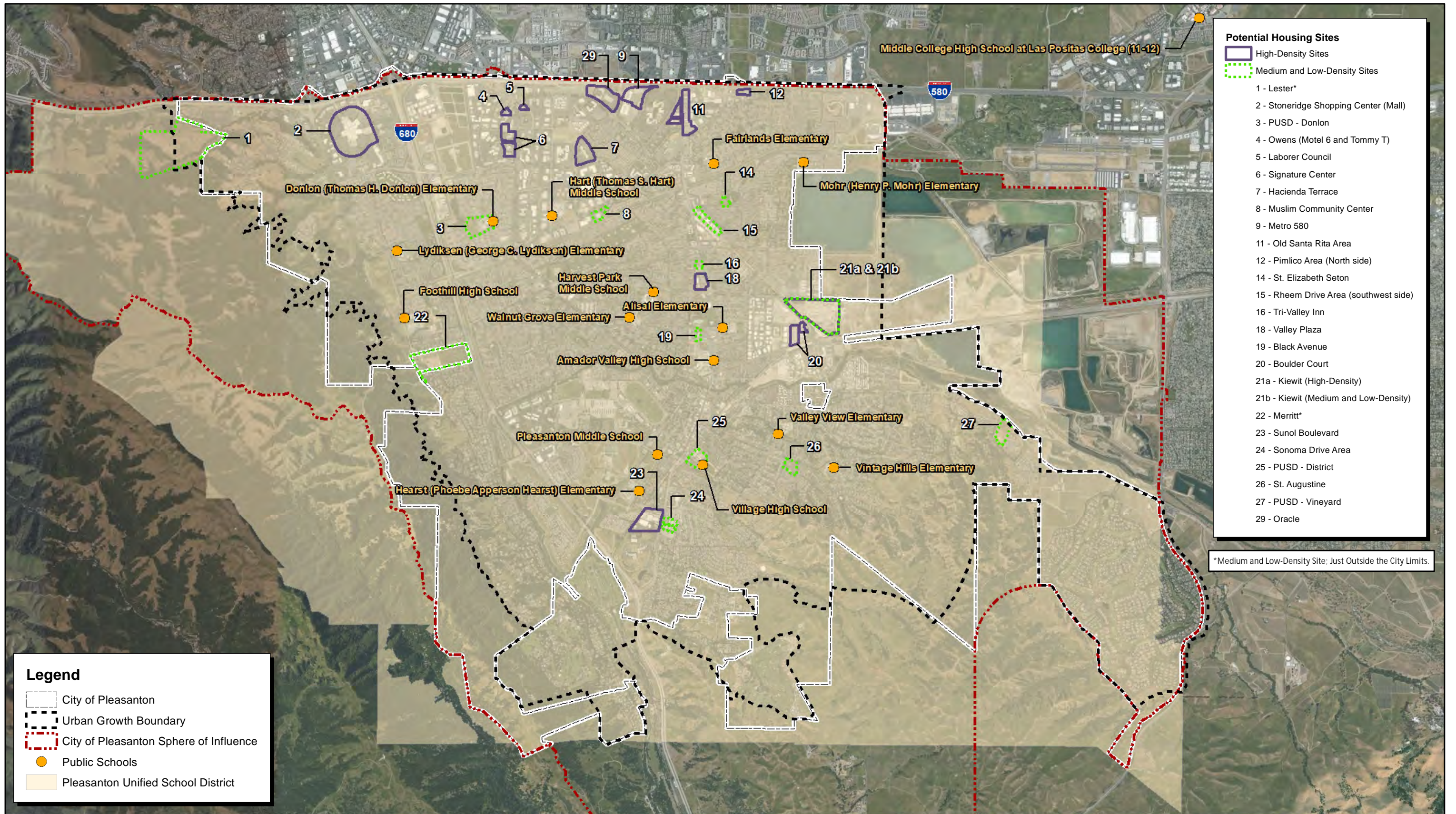


Source: Bing Aerial Imagery, Alameda County



Exhibit 3.13-1
Fire Station Locations

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- Potential Housing Sites**
- High-Density Sites
 - Medium and Low-Density Sites
- 1 - Lester*
 - 2 - Stoneridge Shopping Center (Mall)
 - 3 - PUSD - Donlon
 - 4 - Owens (Motel 6 and Tommy T)
 - 5 - Laborer Council
 - 6 - Signature Center
 - 7 - Hacienda Terrace
 - 8 - Muslim Community Center
 - 9 - Metro 580
 - 11 - Old Santa Rita Area
 - 12 - Pimlico Area (North side)
 - 14 - St. Elizabeth Seton
 - 15 - Rheem Drive Area (southwest side)
 - 16 - Tri-Valley Inn
 - 18 - Valley Plaza
 - 19 - Black Avenue
 - 20 - Boulder Court
 - 21a - Kiewit (High-Density)
 - 21b - Kiewit (Medium and Low-Density)
 - 22 - Merritt*
 - 23 - Sunol Boulevard
 - 24 - Sonoma Drive Area
 - 25 - PUSD - District
 - 26 - St. Augustine
 - 27 - PUSD - Vineyard
 - 29 - Oracle

*Medium and Low-Density Site: Just Outside the City Limits.

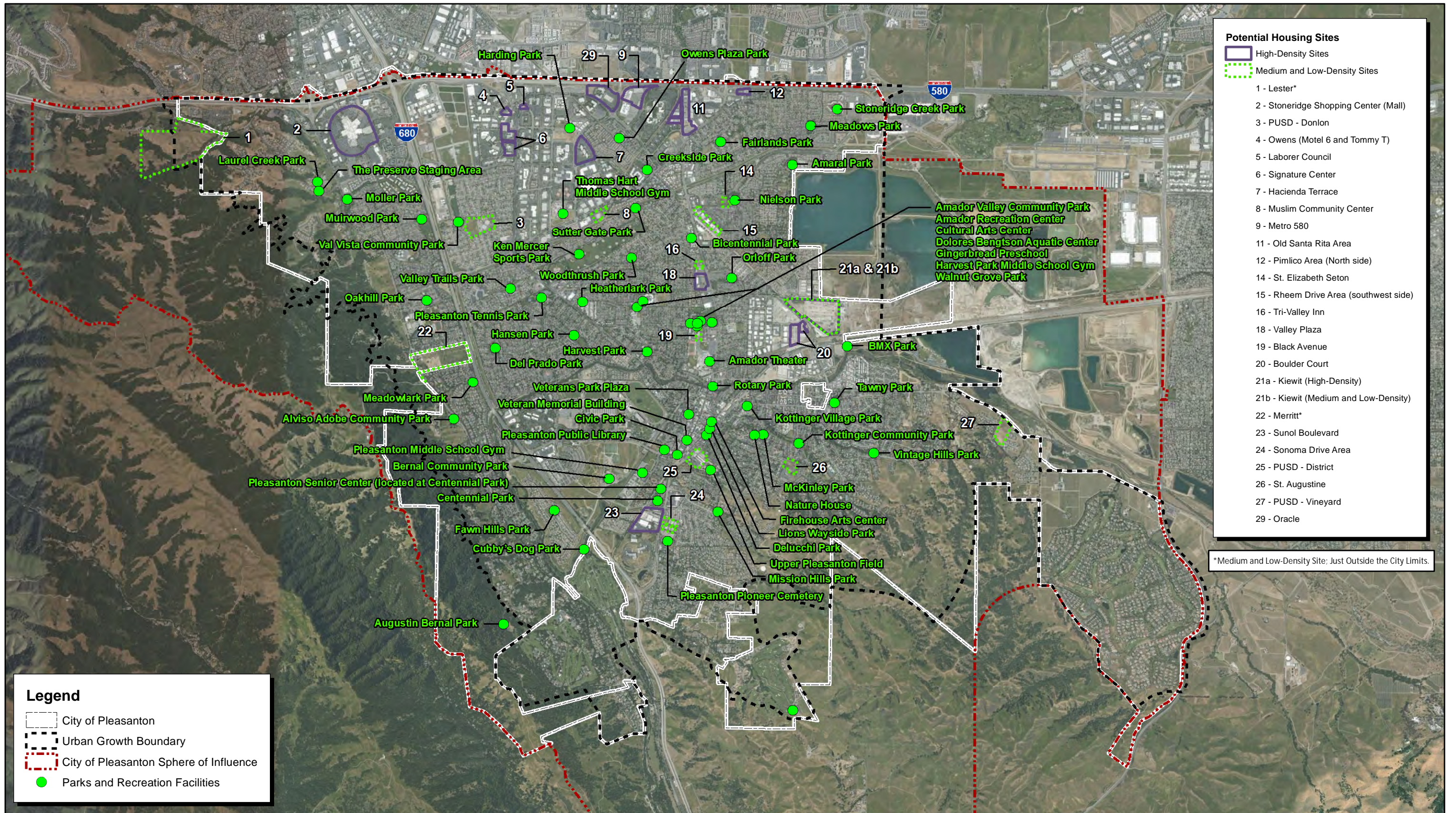
Legend

- City of Pleasanton
- Urban Growth Boundary
- City of Pleasanton Sphere of Influence
- Public Schools
- Pleasanton Unified School District

Source: Bing Aerial Imagery, Alameda County



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Source: Bing Aerial Imagery, Alameda County



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Exhibit 3.13-3
Parks and Recreation Facilities within the City of Pleasanton

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3.14 - Transportation

3.14.1 - Introduction

This section of the Draft Program Environmental Impact Report (Draft Program EIR) addresses potential environmental effects to transportation on the potential sites for housing and surrounding areas resulting from implementation of the proposed 2023-2031 (6th Cycle) Housing Element Update, rezoning, and General Plan and Specific Plan Amendments (collectively referred to herein as the Housing Element Update). This section also evaluates the possible impacts related to transportation that could result from implementation of the Housing Element Update.

The impact analysis examines the potential vehicular, transit, bicycle, and pedestrian components of the City of Pleasanton's overall transportation system from implementation of the Housing Element Update and evaluates the effects related to transportation, including conflicts with applicable plans and policies, hazards, changes in Vehicle Miles Traveled (VMT) per capita, and emergency vehicle access that may result from the implementation of the Housing Element Update. Future projects consistent with the Housing Element Update would be evaluated for project-specific impacts related to transportation at the time they are proposed. Information in this section is based on the project-specific Transportation Impact Assessment (TIA) (included as Appendix G).

3.14.2 - Existing Conditions

Roadway Network

The roadway network serving the City is shown in Exhibit 3.14-1. Key roadways are described below.

Freeways

Freeways are characterized by their limited access and grade separations and primarily serve long-distance trips.

Interstate 580

Interstate 580 (I-580) runs east–west from I-5 in San Joaquin County and ends with a merge into United States Highway 101 (US-101) in Marin County. It is a 10-lane freeway while passing through Pleasanton.

Interstate 680

I-680 runs north–south from I-80 near Fairfield to I-280 in San José. It is a six-lane freeway while passing through Pleasanton south of I-580 with additional High-Occupancy Vehicle (HOV) lanes north of I-580.

State Routes

State Route 84

State Route 84 (SR-84) is a four- to six-lane highway which runs from I-580 in Livermore to I-680 in Sunol and continues to Highway 1 near San Gregorio. SR-84 has recently been realigned, moving the northern section out of the center of the City of Livermore to Livermore's western city limit.

Construction is underway to widen the southern section to four lanes and modify the interchange with I-680.

Arterials, Collectors, and Local Roadways

Arterials are major streets carrying the traffic of local and collector streets to and from freeways and other major streets, with controlled intersections and generally providing direct access to properties. Limited direct access to industrial, commercial, and high-density residential uses is permitted, as approved through the City's development review process.

Arterials

Foothill Road

Foothill Road is a north–south road. It has two lanes from its southern end until it intersects with Moller Ranch Drive. From there until Deodar Way, it has four lanes and then it meets I-580 and widens to six lanes. It provides access to Foothill High School. It connects SR-84 with I-580.

Hopyard Road

Hopyard Road is a north–south road. It starts from the intersection of Division Street and Del Valle Parkway. Initially it has two lanes until it intersects with Secretariat Drive and widens to four lanes. From its intersection with Parkside Drive until I-580 it has six lanes.

Santa Rita Road

Santa Rita Road is a north–south road. It is an extension of Main Street. Initially on its southern end, it has four lanes until its intersection with Valley Avenue. From Valley Avenue until it meets I-580, it has six lanes.

Hacienda Drive

Hacienda Drive is a north–south road. It starts at West Las Positas Boulevard and continues to I-580. It is a six-lane road and intersects with Stoneridge Drive.

Stoneridge Drive

Stoneridge Drive is an east–west road. It is an extension of West Jack London Boulevard and becomes Stoneridge Drive west of the intersection with El Charro Road. It intersects with Santa Rita Road, Hacienda Drive, and Hopyard Road. Initially it is a four-lane road but widens to six lanes after its intersection with West Las Positas Boulevard. Stoneridge Drive intersects I-680.

Bernal Avenue

Bernal Avenue is an east–west road. It is an extension of Valley Avenue toward the south from the intersection with Stanley Boulevard. It has four lanes until it intersects with Valley Avenue and becomes a six-lane road.

Sunol Boulevard

Sunol Boulevard is an east–west road and an extension of First Street after the Bernal intersection. It is a four-lane road until it intersects Sycamore Road, where it becomes a six-lane road.

West Las Positas Boulevard

West Las Positas Boulevard is an east–west road. It connects Foothill Road to Santa Rita Road. Starting with two lanes at Foothill Road, the road expands to four lanes after crossing the South San Ramon Creek and again to six lanes after crossing Hopyard Road. West Las Positas Boulevard is scheduled for a corridor improvement to be constructed in 2024, as described in the West Las Positas Bikeway Project,¹ with the goal of improving bicycle and pedestrian facilities.

Valley Avenue

Valley Avenue is an east–west road. It circles Downtown Pleasanton and merges into Bernal Avenue after the intersection with Stanley Boulevard. It begins as a two-lane road and then widens to four after bisecting Bernal Avenue. Valley Avenue intersects Hopyard Road, Santa Rita Road, and Stanley Boulevard.

El Charro Road

El Charro Road is a north–south road that begins as a private roadway at Busch Road becoming public just south of the intersection with Stoneridge Drive and West Jack London Boulevard. It ends at I-580. It is a two-lane road for most of its length but widens into a six-lane road approaching the freeway after the intersection with Stoneridge Drive and West Jack London Boulevard. As stated in the General Plan, the City plans to have El Charro Road extended southward to connect to Stanley Boulevard.

First Street

First Street is a north–south road that begins at Sunol Boulevard to the south and merges into Stanley Boulevard to the north. It provides access to Downtown Pleasanton. It is a two-lane road.

Stanley Boulevard

Stanley Boulevard is an east–west road that begins at Main Street in Pleasanton and ends at First Street in Livermore. It serves as a major roadway accessing central Pleasanton. It is primarily a four-lane road with the exception of a short two-lane section between Main Street and First Street intersections in Pleasanton.

Vineyard Avenue

Vineyard Avenue is an east–west road. It begins off First Street to the west and ends at an intersection with SR-84. It is a two-lane road.

Collectors

Collectors provide access to adjacent land uses and feed local traffic to arterials. Residential collectors provide access to residential areas and feed traffic from local streets to arterials. By design, local streets serve only adjacent land uses in both commercial and residential areas and provide direct access to these land uses.

¹ City of Pleasanton. 2020. West Las Positas Bikeway Feasibility Study. June.

Willow Road

Willow Road is a collector, and it is a south–east road. It extends from West Las Positas Boulevard on its southern end until Owens Drive on its northern end. It is a four-lane road with bike lanes.

Inglewood Drive

Inglewood Drive is a collector, and it is an east–west road. It is a residential collector from its western end at Mason Street to the intersection with Hopyard Road where it becomes a collector until it reaches its eastern end at Hacienda Drive. It also intersects with Willow Road. It is a two-lane road.

Rosewood Drive

Rosewood Drive is a collector that is an east–west road. It extends from Owens Drive to Santa Rita Road. It is a four-lane road.

Old Santa Rita Road

Old Santa Rita Road is a collector. It is a north–south road with two lanes and extends from Santa Rita Road to Rosewood Drive.

Case Avenue

Case Avenue is a collector, and it is mostly a north–south oriented roadway. It is a two-lane road. It extends from Valley Avenue on its southern end until Bernal Avenue on its northern end. This road passes by Hearst Elementary School and Pleasanton Middle School.

Main Street

Main Street is a collector, and it is a north–south road. It is a two-lane road that extends from Bernal Avenue on its southern end until Stanley Boulevard on its northern end.

Stoneridge Mall Road

Stoneridge Mall Road is a collector and is a north–south road. It is a four-lane road that provides service to the Stoneridge Shopping Center.

Alternative Transportation Modes

Public Transit Service and Facilities

The city is served by numerous public transportation services that help residents and employees get to their work or home destination, whether it is in the city or another local destination. Exhibit 3.14-2 shows the existing transit routes throughout the city.

Pleasanton Paratransit

Pleasanton Paratransit Service provides local door-to-door and fixed-route bus service for seniors and Americans with Disabilities Act (ADA)-qualified individuals ages 18 and older. Eligible riders may use the service Monday, Wednesday, and Friday, between the hours of 8:00 a.m. and 5:00 p.m.

Bay Area Rapid Transit

There are two Bay Area Rapid Transit (BART) stations within the city along I-580, the West Dublin-Pleasanton BART station, located next to the Stoneridge Shopping Center, and the Dublin-Pleasanton

BART station (east), an end-station located on Owens Drive. BART operates from 5:00 a.m. until 1:00 a.m. on weekdays. On Saturdays it runs from 6:00 a.m. until 1:00 a.m., and on Sundays from 7:00 a.m. until 1:00 a.m.

Wheels–Livermore Amador Valley Transit Authority

Wheels offers a variety of local transit services to meet the transportation needs of those who live, work, and visit the Tri-Valley. There are currently seven routes that serve the city.

- **Route 3:** Route 3 provides all day service in the city between the West Dublin-Pleasanton BART station and the Stoneridge Shopping Center. Route 3 provides service in Hacienda, as well as to the residential and medical buildings in the Stoneridge Shopping Center area. During weekdays its operation starts at 6:23 a.m. and ends 10:58 p.m. During AM and PM peak-hours the headway is 30 minutes, while during off peak-hours the headway is 1 hour. On weekends it operates from 8:15 a.m. until 11:00 p.m. with a headway of 40 to 60 minutes.
- **Route 8:** Route 8 operates as a bi-directional route between the Dublin-Pleasanton BART station (east) and South Pleasanton along Hopyard and Valley, providing a connection to Downtown Pleasanton. Route 8 provides service to the Pleasanton Senior Center, Downtown Pleasanton, Kottinger Park, and Vineyard. Route 8 operates every 30 minutes during peak periods, and every 60 minutes midday and on weekends. On weekdays the operation starts at 6:08 a.m. and ends at 8:57 p.m. During weekends it starts at 8:00 a.m. and ends 9:00 p.m.
- **Route 14:** Route 14 operates seven days a week, providing connections between Livermore, Pleasanton and Dublin-Pleasanton BART (east) via Jack London and Stoneridge. Route 14 provides service to the Livermore Transit Center, the Livermore Civic Center complex, central Livermore/Olivina, Jack London, San Francisco Premium Outlets, Stoneridge Creek senior living community, Hacienda, and the Dublin-Pleasanton BART station (east). The headway ranges between 30 to 60 minutes. During weekdays the operation starts at 6:30 a.m. and ends at 9:45 p.m. On Saturdays it operates from 6:30 a.m. to 9:30 p.m. On Sundays it starts at 8:15 a.m. and runs until 10:00 p.m.
- **Route 53:** Route 53 operates only weekdays during the morning and afternoon and connects the Altamont Commuter Express (ACE) station with the Stoneridge Shopping Center. The operation starts at 5:30 a.m. and ends 9:00 a.m. in the morning; in the afternoon, it starts at 4:00 p.m. and ends 7:15 p.m.
- **Route 54:** Route 54 operates only weekdays during the morning and afternoon and connects the ACE Station with the Dublin-Pleasanton BART station (east). Operation starts at 6:45 a.m. and ends 8:15 a.m. In the afternoon it starts at 3:45 p.m. and ends at 6:15 p.m.
- **Route 10R:** Route 10R connects the Dublin-Pleasanton BART station (east) with Livermore Transit Center. Weekdays operation starts at 4:30 a.m. and ends at 11:15 p.m. and maintains a headway of 30 minutes most of the day. On Saturdays the operation starts at 5:00 a.m. and ends at 11:15 p.m. The headway ranges between 30 to 60 minutes. On Sundays, operation starts at 5:45 a.m. and ends at 11:15 p.m., with a headway that ranges from 30 to 60 minutes.

ACE Rail–Altamont Commuter Express

ACE Rail provides commuter service from Stockton to San José through Pleasanton in the AM and reverse direction in the PM hours. Four trains run on the weekdays only and for special events. During the morning, service starts at 4:10 a.m., with the first train arriving at the Pleasanton station around 5:20 a.m. Headways between trains during the AM service is 60-90 minutes. During the PM service, the first ACE train leaves the San José Station at 3:35 p.m. and arrives at Pleasanton at around 4:30 p.m. Headways between trains are 60 minutes. The Pleasanton station is located at 4950 Pleasanton Avenue across from the main entrance to the Alameda County Fairgrounds.

Valley Link

The Valley Link project is a transit service proposed that would construct a new 42-mile seven-station passenger rail project linking BART in the Tri-Valley area with ACE in northern San Joaquin County. Specifically, the new service would connect BART at the existing Dublin-Pleasanton BART station (east) with the approved ACE North Lathrop Station. The new service would use existing transportation corridors, including the existing I-580 corridor (11.7 miles) in the Tri-Valley area; the Alameda County Transportation Corridor right-of-way through the Altamont Pass (14.5 miles); and the existing Union Pacific Railroad (UPRR) Corridor (16.1 miles) in Northern San Joaquin County. Stations would be provided at the following locations: Dublin-Pleasanton (BART Intermodal), Isabel (Livermore), Southfront Road Station (Livermore), Mountain House, Downtown Tracy Station (Tracy), River Islands Station (Lathrop) and North Lathrop Station (ACE Intermodal). On May 12, 2021, the Valley Link Board certified the project's Final EIR and preliminary engineering on the project is currently underway.

Bicycle Facilities

Bicycle planning and design typically relies on guidelines and design standards established by the California Department of Transportation (Caltrans) in the Highway Design Manual (Chapter 1000: Bikeway Planning and Design). The Highway Design Manual provides four distinct types of bikeway facilities, as described below:

- Class I Bikeways (Shared-Use Paths) provide a separate right-of-way and are designated for the exclusive use of bicycles and pedestrians, with vehicle and pedestrian crossflow minimized. In general, bike paths serve corridors where on-street facilities are not feasible or where sufficient right-of-way exists to allow them to be constructed.
- Class II Bikeways (Bicycle Lanes) are dedicated lanes for bicyclists generally adjacent to the outer vehicle travel lanes. These lanes have special lane markings, pavement legends, and signage. Bicycle lanes are typically at least five feet wide. Adjacent vehicle parking and vehicle/pedestrian crossflow are permitted. Class II buffered bike lanes provide greater separation from an adjacent traffic lane and/or between the bike lane and on-street parking. This separation is created with chevron or diagonal striping.
- Class III Bikeways (Bicycle Routes) are designated by signs or pavement markings for shared use with pedestrians or motor vehicles but have no separated bike right-of-way or lane striping. Bike routes serve either to a) provide a connection to other bicycle facilities where

dedicated facilities are infeasible, or b) designate preferred routes through high-demand corridors.

- Class IV Bikeways (Cycle Tracks Or “Separated” Bikeways) provide a right-of-way designated exclusively for bicycle travel within a roadway and are protected from other vehicle traffic by physical barriers, including, but not limited to, grade separation, flexible posts, inflexible vertical barriers such as raised curbs, or parked cars.

Existing and planned bicycle facilities are shown on Exhibit 3.14-3, based on the City of Pleasanton Bicycle and Pedestrian Master Plan (Master Plan).² According to the Master Plan, there are approximately 13 miles of paved Class I paths, 40 miles of Class II lanes, and 7 miles of Class III routes in the city. Major existing bicycle facilities include:

- **Iron Horse Trail:** This is a 32-mile-long regional trail that connects the cities of Concord, Pleasant Hill, Walnut Creek, Alamo, Danville, San Ramon, and Dublin that follows the Southern Pacific Railroad right of way. In the City of Pleasanton, it extends to the Dublin-Pleasanton BART station (east) to the Shadow Cliffs Regional Recreation Area, where it currently terminates.
- **Centennial Trail:** Centennial Trail is an 8-mile trail that runs north–south on the west side of Pleasanton parallel to I-680 between the southside of I-580 and Arroyo del Valle, where it changes its orientation to east–west and runs parallel to Arroyo del Valle until it ends at Calle Santa Ana roadway near Hopyard Road.
- **Arroyo Mocho Trail:** The Arroyo Mocho Trail begins at the Centennial Trail and that runs along the south side of the Arroyo Mocho which runs parallel to West Las Positas Boulevard.
- **Marilyn Murphy Kane Trail:** This is a 1.4-mile-long trail that follows the Arroyo de la Laguna from the trail staging area, southward to Bernal Canal, then northeast along the Bernal Canal to Valley Avenue.

The Master Plan identifies the following recommended bicycle facility improvements within or adjacent to the potential sites for housing.

- **Bernal Avenue:** Buffered bicycle lanes are proposed on Bernal Avenue in the near-term between Foothill Road and Stanley Boulevard. As a phased strategy, the buffered bicycle lanes can later become a physically separated bikeway to maximize protection for cyclists. This project also includes crosswalk enhancements where Bernal Avenue intersects the Kottinger Community Park paths. This project focuses on providing safe pedestrian and bike routes.
- **Centennial Trail to Iron Horse Trail:** The Centennial Trail to Iron Horse Trail project provides an east–west connection in the northern part of the city on Johnson Drive and Owens Drive. The project provides a low-stress bicycle connection between the Centennial Trail, Dublin-Pleasanton BART station (east), area employers, and the Iron Horse Trail. The project also focuses on improving pedestrian safety and connectivity through improved crossing opportunities near BART.

² City of Pleasanton. 2018. Bicycle and Pedestrian Master Plan.

- **East Side:** The East Side project connects Amador Valley High School, Alisal Elementary School, Orloff Park, Iron Horse Trail, and Mohr Elementary School with a bicycle boulevard along residential streets in the neighborhoods east of Santa Rita Road. It also provides access from the east side neighborhoods to Downtown. The bicycle boulevard begins on School Street, continues on Kolln Street, and connects with the Mohr Avenue bicycle boulevard in order to provide a bike path alternative to Santa Rita Road.
- **Stanley Boulevard:** The Stanley Boulevard project consists of a separated bikeway between Valley Avenue and First Street with additional bicycle and pedestrian improvements at the intersection with Valley Avenue.
- **Stoneridge Drive:** The Stoneridge Drive project would convert existing bicycle lanes to buffered bicycle lanes along the whole corridor in the near-term, with installation of separated bikeways in the long-term from Foothill Road to Santa Rita Road.
- **Stoneridge Mall Road:** The Stoneridge Mall Road project identifies a mixed use path along the eastern side of the roadway connecting Stoneridge Drive to the West Dublin-Pleasanton BART station. Future plans also include completing a two-way protected bicycle lane around the outer edge of this circular roadway.
- **Sunol Boulevard:** The Sunol Boulevard project provides a continuous buffered bicycle lane in the near-term and includes bicycle and pedestrian improvements at signalized intersections from Castlewood Drive to Bernal Avenue. In the long-term, separated bikeways are recommended for Sunol Boulevard.
- **West Las Positas Boulevard:** The West Las Positas Boulevard creates a separated bikeway in the near-term as well as a series of pedestrian safety improvements near Hart Middle School and Fairlands Elementary School. It would extend from Foothill Road to the North Pimlico Drive intersection.

Pedestrian Facilities

Pedestrian facilities are available throughout most urbanized areas of the city, including sidewalks, wheelchair ramps, and crosswalks. There are still some outlying areas that remain underdeveloped, and do not have sidewalks. Improvements are categorized as proposed walkways, trails and intersection improvements designed to improve recreational, utilitarian, and school access. The Master Plan identifies the following recommended pedestrian facility improvements within or adjacent to the potential sites for housing:

- **Downtown:** The Downtown project would enhance walking and biking routes to and within Downtown through bicycle boulevards, sidewalk gap closures, and pedestrian crossing enhancements. This project also includes a study to repurpose the old Southern Pacific Railroad right-of-way into a shared-use path through and to the south of Downtown. Details for the improvements involve restriping sidewalks, installing curb extensions, enhancing slip lanes, checking curb radii, and adding a signalized crosswalk.
- **Foothill Road:** The Foothill Road project consists of safe routes to school projects and a complete streets study of the entire length of Foothill Road. The near-term improvements include walking and biking access for students at Lydiksen Elementary School and Foothill High

School. The project would add or repair sidewalks and enhance the sidewalk with Pedestrian Hybrid Beacons (PHB).

- **Valley Avenue:** This project would improve bicycle and pedestrian access to Pleasanton Middle School located on Case Avenue, Harvest Park Middle School, Alisal Elementary School, and Amador Valley High School with crosswalk improvements and traffic calming. Improvement details include adding a shared-use path, restriping crosswalks, and enhancing crosswalks with Rectangular Rapid-Flashing Beacons (RRFB).
- **Stoneridge Mall Road:** This project would improve pedestrian access to the Stoneridge Shopping Center, as the Stoneridge Shopping Center has a large parking lot surrounding the main shopping attractions but few pedestrian amenities. Safety would be improved by installing/repairing sidewalks, improving walkways, restriping crosswalks, and adding shared-use paths. Additionally, access to the West Dublin-Pleasanton BART station would be improved.
- **Owens Drive:** This project looks to improve the Owens Drive/Hopyard Road/Willow Road intersection area. Improvements would include adding shared-use paths, walkway improvements, enhanced crosswalks with PHB, restriping the crosswalks and reducing the size and pedestrian crossing distances of the signalized intersections, which would provide better pedestrian access to the Dublin-Pleasanton BART station (east).

Vehicle Miles Traveled

One performance measure used to quantify automobile travel is VMT, which refers to the amount of automobile travel attributable to a project as well as the distance traveled. In 2013, Governor Brown signed Senate Bill (SB) 743, which added Public Resources Code Section 21099 to the California Environmental Quality Act (CEQA). Public Resources Code Section 21099 changes the way transportation impacts are analyzed and aligns local environmental review methodologies with Statewide objectives to reduce greenhouse gas (GHG) emissions, encourage infill mixed-use development in designated priority development areas, reduce regional sprawl, and reduce VMT in California.

Increased VMT leads to various direct and indirect impacts on the environment and human health. Among other effects, increased VMT on the roadway network leads to increased emissions of air pollutants, including GHGs, and increased energy consumption. The transportation sector is associated with more GHG emissions than any other sector in California. As documented in the City's 2022 Climate Action Plan 2.0 (CAP 2.0),³ about 64 percent of Pleasanton's GHG emissions are produced by local gas and diesel vehicles. Reducing VMT is one of the most effective means for reducing the City's GHG emissions.

Table 3.14-1 provides the VMT estimate for Alameda County from the Alameda County Transportation Commission (Alameda CTC) Model. The Alameda CTC Model includes data from February of 2020, which represents conditions prior to the COVID-19 pandemic; which is a

³ City of Pleasanton. 2022. Climate Action Plan 2.0. March.

conservative approach to the modeling volumes. Table 3.-14-1 shows the baseline (existing) home-based VMT per resident and total VMT per service population for Alameda County.

Table 3.14-1: Baseline VMT Summary

VMT Area	Baseline (2020) VMT	
	Home-Based VMT per Resident	Total VMT per Service Population
Alameda County	19.4	26.6
Notes: VMT = Vehicle Miles Traveled		

Level of Service

State law has changed with respect to how transportation-related impacts may be addressed under CEQA. Traditionally, lead agencies used Level of Service (LOS) to assess the significance of development impacts, with greater levels of congestion considered to be more significant than lesser levels. Mitigation measures typically took the form of capacity-increasing improvements, which often had their own environmental impacts (e.g., to biological and cultural resources). Depending on circumstances, and an agency’s tolerance for congestion (e.g., as reflected in its general plan), LOS D, E, or F often represented significant environmental effects. In 2013, however, the Legislature passed legislation with the intent of ultimately doing away with LOS in most instances as a basis for environmental analysis under CEQA. Enacted as part of SB 743, Public Resources Code Section 21099, subdivision (b)(1), directed the OPR to prepare, develop, and transmit to the Secretary of the Natural Resources Agency for certification and adoption proposed CEQA Guidelines addressing “criteria for determining the significance of transportation impacts of projects within transit priority areas. Those criteria shall promote the reduction of greenhouse gas emissions, the development of multimodal transportation networks, and a diversity of land uses. In developing the criteria, [OPR] shall recommend potential metrics to measure transportation impacts that may include, but are not limited to, VMT, VMT per capita, automobile trip generation rates, or automobile trips generated. The office may also establish criteria for models used to analyze transportation impacts to ensure the models are accurate, reliable, and consistent with the intent of this section.” While not required by CEQA and not included as part of this Draft Program EIR, a LOS evaluation is required by the General Plan; a separate report including a LOS analysis will be provided to the City, and LOS impacts would be evaluated by the City prior to adoption of the Housing Element Update.

Emergency Access and Routes

The Comprehensive Emergency Management Plan outlines general procedures in response to emergency crises, such as evacuations. In terms of evacuation, the main roads into and out of the vicinity of the potential sites for housing would be I-680 in the north–south direction and I-580 in the east–west direction. These roads would act as the main evacuation routes into and out of the city.

3.14.3 - Regulatory Framework

State

Assembly Bill 1358

Assembly Bill (AB) 1358, also known as the California Complete Streets Act of 2008, requires cities and counties to include “Complete Streets” policies in their general plans. These policies address the safe accommodation of all users, including bicyclists, pedestrians, motorists, public transit vehicles and riders, children, the elderly, and the disabled. These policies can apply to new streets as well as the redesign of corridors. In December 2012, the City adopted a “Complete Streets Policy.”

Senate Bill 375

SB 375 provides guidance regarding reducing emissions from cars and light trucks. There are four major components to SB 375. First, SB 375 requires regional GHG emission targets. These targets must be updated every 8 years in conjunction with the revision schedule of the housing and transportation elements of local general plans. Second, Metropolitan Planning Organizations (MPOs) are required to create a Sustainable Communities Strategy (SCS) that provides a plan for meeting regional targets. Third, SB 375 requires housing elements and transportation plans to be synchronized on 8-year schedules. Finally, MPOs must use transportation and air emissions modeling techniques that are consistent with the guidelines prepared by the California Transportation Commission. The applicable SCS for the nine-county Bay Area Region is Plan Bay Area 2050, which was adopted in 2021 by the Association of Bay Area Governments (ABAG)/Metropolitan Transportation Commission (ABAG/MTC).

Senate Bill 743

Passed in 2013, SB 743 changes the focus of transportation impact analysis in CEQA Guidelines from measuring impacts to drivers to measuring the impact of driving. The change was made to replace LOS (delay based impacts) with VMT (distance based impacts). This shift in transportation impact focus is intended to better align transportation impact analysis and mitigation outcomes with the State’s goals to reduce GHG emissions, encourage infill development, and improve public health through development of multimodal transportation networks. LOS or other delay metrics may still be used to evaluate the impact of projects on drivers as part of land use entitlement review and impact fee programs.

In December 2018, the Natural Resources Agency finalized updates to Section 15064.3 of the CEQA Guidelines, including the incorporation of SB 743 modifications. The Guidelines’ changes were approved by the Office of Administrative Law and, as of July 1, 2020, are in effect Statewide.

To help aid lead agencies with SB 743 implementation, the Governor’s Office of Planning and Research (OPR) produced the Technical Advisory on Evaluating Transportation Impacts in CEQA⁴ that provides guidance about the variety of implementation questions they face with respect to shifting to a VMT metric. Key guidance from this document includes the following:

⁴ Governor’s Office of Planning and Research (OPR). 2018. Technical Advisory: On Evaluating Transportation Impacts in CEQA. December.

- VMT is the most appropriate metric to evaluate a project's transportation impact.
- OPR recommends tour- and trip-based travel models to estimate VMT but ultimately defers to local agencies to determine the appropriate tools.
- OPR recommends measuring VMT for residential and office projects on a "per rate" basis.
- OPR recommends that a per resident or per employee VMT that is 15 percent below that of existing development may be a reasonable threshold. In other words, a residential or office project that generates VMT per resident or employee that is more than 85 percent of the regional VMT average could result in a significant impact. OPR notes that this threshold is supported by evidence that connects this level of reduction to the State's emissions goals.
- OPR recommends that where a project replaces existing VMT-generating land uses, if the replacement leads to a net overall decrease in VMT, the project would lead to a less than significant transportation impact. If the project leads to a net overall increase in VMT, then the thresholds described above should apply.
- Lead agencies have the discretion to set or apply their own significance thresholds.

Caltrans Construction and Safety Requirements

Caltrans issued the VMT-Focused Transportation Impact Study Guide (TISG) in May 2020,⁵ providing the process by which Caltrans will review and assess VMT impacts of land development projects. The TISG generally aligns with the guidance in the OPR Technical Advisory.

Caltrans also issued the Transportation Analysis Framework (TAF) in September 2020,⁶ which details methodology for calculating induced travel demand for capacity increasing transportation projects on the State Highway System. Caltrans also issued the Transportation Analysis Under CEQA⁷ guidance in September 2020 which describes significance determinations for capacity-increasing projects on the State Highway System. It is noted that the Housing Element Update does not propose any changes to the Caltrans owned and operated network.

Caltrans also issued Traffic Safety Bulletin 20-02-R1: Interim Local Development Intergovernmental Review Safety Review Practitioner Guidance in December 2020,⁸ describing the methods with which Caltrans will assess the safety impacts of projects on the Caltrans owned and operated network. This guidance states that Caltrans will provide its safety assessment to lead agencies for inclusion in environmental documents.

Finally, Caltrans has adopted procedures to oversee construction activities on and around its facilities. The Caltrans Construction Manual⁹ describes best practices for construction activities, including personnel and equipment safety requirements, temporary traffic control, signage, and

⁵ California Department of Transportation (Caltrans). 2020. Vehicle Miles Traveled-focused Transportation Impact Study Guide. May 20.

⁶ California Department of Transportation (Caltrans). 2020. Transportation Analysis Framework: Evaluating Transportation Impacts of State Highway System Project, First Edition. September.

⁷ California Department of Transportation (Caltrans). 2020. Transportation Analysis Under CEQA, First Edition. September.

⁸ California Department of Transportation (Caltrans). 2020. Traffic Safety Bulletin 20-02-R1: Interim Local Development Intergovernmental Review Safety Review Practitioners Guidance. December 18.

⁹ California Department of Transportation (Caltrans). 2022. Construction Manual, 2021 Edition.

other requirements aimed at reducing construction-related hazards and constructing projects safely and efficiently. Any work proposed on Caltrans facilities would be required to abide by these requirements.

Regional

Plan Bay Area

Plan Bay Area 2050 is a long-range integrated transportation and land-use/housing strategy through 2050 for the San Francisco Bay Area. On October 21, 2021, the Association of Bay Area Governments (ABAG) Executive Board and the Metropolitan Transportation Commission (MTC) jointly approved the plan. Plan Bay Area 2050 connects the elements of housing, the economy, transportation, and the environment through 35 strategies that will make the Bay Area more equitable for all residents and more resilient in the face of unexpected challenges. In the short-term, the plan's Implementation Plan identifies more than 80 specific actions for MTC, ABAG, and partner organizations to take over the next five years to make headway on each of the 35 strategies. Plan Bay Area is the nine-county region's long-range plan designed to meet the requirements of SB 375.

Metropolitan Transportation Commission

The majority of federal, State, and local financing available for transportation projects is allocated at the regional level by MTC, the transportation planning, coordinating, and financing agency for the nine-county Bay Area.

Alameda County Transportation Commission

The Alameda CTC is a joint powers authority governed by a 22-member commission that comprises elected offices from each of the 14 cities in Alameda County; the Alameda County Board of Supervisors; and elected representatives for Alameda County Transit and BART. The Alameda CTC coordinates countywide transportation planning efforts and delivers projects and programs.

Alameda CTC also serves as the County's congestion management agency. The Alameda CTC administers a Land Use Analysis Program, which is one of the legislatively required elements of the Alameda CTC Congestion Management Program. Alameda CTC reviews local land use plans and projects with the potential to cause countywide or regional impacts. The purpose of the Alameda CTC's review is to assess impacts of individual development actions on the regional transportation system and ensure that significant impacts are appropriately mitigated.

Alameda CTC guidelines state that impacts on all modes of transit should be considered, as follows:

- **Transit:** Effects of vehicle traffic on mixed-flow transit operations, transit capacity, transit access/egress, the need for future transit service, consistency with adopted plans, and circulation element needs.
- **Bicycles:** Effects of vehicle traffic on bicyclist conditions, site development and roadway improvements, and consistency with adopted plans.
- **Pedestrians:** Effects of vehicle traffic on pedestrian conditions, site development and roadway improvements, and consistency with adopted plans.

- Other Impacts and Opportunities: Noise impacts for projects near State highway facilities and opportunities to clear access improvements environmentally for transit-oriented development projects.

Alameda CTC Countywide Transportation Plan

The Countywide Transportation Plan (CTP)¹⁰ establishes near-term priorities and guides long-term decision-making for the Alameda CTC. It establishes a vision for the County's complex transportation system that supports vibrant and livable communities. The CTP is updated every four years and serves as a key input into the region's transportation plan, Plan Bay Area 2050. The current CTP covers transportation projects, policies, and programs out to the year 2050 for Alameda County.

The CTP includes two companion documents:

- **Community-Based Transportation Plan:** An assessment of transportation needs in the County's low-income communities and communities of color with a focus on input collected via community engagement activities.
- **New Mobility Roadmap:** A document that provides a foundation for agency policy, advocacy, and funding decisions to advance new mobility technologies and services for the Alameda CTC and partner agencies as well as the private sector. The outcome of the New Mobility Roadmap is a set of seven initiatives, each of which has a comprehensive list of potential actions that could be taken to address and implement new mobility technologies and services in Alameda County.

Priority projects and programs to be prioritized over the next 10 years are identified under the CTP. This list includes seven projects located in the city:

- I-680 Express Lanes: SR-84 to Alcosta (Phase 1–Southbound)
- I-580/I-680 Interchange (Phase 1)
- Dublin-Pleasanton BART Station Active Access Improvements
- I-580/Fallon/El Charro Interchange Modernization (Phase 2)
- Iron Horse Trail Improvements
- I-680 Sunol Interchange Modernization
- West Las Positas Bike Corridor Improvements

Local

City of Pleasanton

General Plan

Streets in and around the plan area are generally under the City's authority, with the exception of SR-84, I-580, and I-680, which all fall under Caltrans jurisdiction. The General Plan contains the following policies and actions relevant to the Housing Element Update:

¹⁰ Alameda County Transportation Commission (Alameda CTC). 2020. Alameda Countywide Transportation Plan. December.

Land Use Element

- Goal 2** Achieve and maintain a complete well-rounded community of desirable neighborhoods, a strong employment base, and a variety of community facilities.
- Policy 4** Allow development consistent with the General Plan Land Use Map.
- Policy 9** Develop new housing in infill and peripheral areas which are adjacent to existing residential development, near transportation hubs or local-serving commercial areas.
- Goal 3** Develop in an efficient, logical, and orderly fashion.
- Policy 23** Regulate the number of housing units approved each year to adequately plan for infrastructure and assure City residents of a predictable growth rate.

Circulation Element

- Goal 1** Develop a safe, convenient, and uncongested circulation system.
- Policy 1** Complete the City's street and highway system in accordance with the General Plan Map.
- Policy 2** Phase development and roadway improvements so that levels of service at adjacent major intersections do not exceed LOS D at major intersections outside Downtown and gateway intersections.¹¹
- Policy 3** Facilitate the free flow of vehicular traffic on major arterials.
- Policy 4** In the Downtown, facilitate the flow of traffic and access to Downtown businesses and activities consistent with maintaining a pedestrian-friendly environment.
- Goal 4** Provide a multimodal transportation system which creates alternatives to the single-occupancy automobile.
- Policy 13** Phase transit improvements to meet the demand for existing and future development.
- Policy 22** Create and maintain a safe, convenient, and effective bicycle system which encourages increased bicycle use.
- Policy 23** Create and maintain a safe and convenient pedestrian system which encourages walking as an alternative to driving.

¹¹ While not required by CEQA and not included as part of this Draft Program EIR, a LOS evaluation is required by this policy; a separate report including a LOS analysis identifying applicable improvements will be provided to the City, and LOS impacts would be evaluated by the City prior to adoption of the Housing Element Update.

Housing Element

The Housing Element is the primary tool used by the State to ensure local governments are appropriately planning for and accommodating enough housing across all income levels for the planning period 2023-2031. The Housing Element is a mandatory part of a jurisdiction's General Plan, but it differs from other General Plan elements in two key aspects: (1) it must be updated every 8 years for jurisdictions within an MPO, such as ABAG; and (2) it must also be reviewed and approved by the California Department of Housing and Community Development (HCD) to ensure compliance with statutory requirements. Goals, policies, and programs regarding transportation in the Housing Element are provided in Chapter 2, Project Description, specifically, Goal 6, Policy 6.5, and Programs 6.2 and 6.4 provide guidance for transportation.

Hacienda Planned Unit Development Plan Design Guidelines

The Hacienda Planned Unit Development (PUD) area is generally located south of I-580, west of Tassajara Creek, north of West Las Positas Boulevard, and east of Hopyard Road. The Hacienda PUD Development Plan Design Guidelines (Hacienda Design Guidelines) ensure that development within the Hacienda PUD area is within the best interests of the public's health, safety, and general welfare, is consistent with the General Plan, is compatible with existing developed properties, presents a positive image for the city along the I-580 frontage, and conforms to the purpose of the PUD.

Section 1.3 provides standards and guidelines with respect to Transit Oriented Development (TOD), which are meant to promote a building character, street scale, and street-level uses that will allow the incremental development of a TOD "village," encourage pedestrian activity, and promote easy access to the Dublin-Pleasanton BART station (east). Section 2.3 includes circulation hierarchy which emphasizes pedestrian access over vehicular access while allowing for convenient secondary circulation for vehicles. Section 2.6 provides standards for internal circulation, which includes internal streets, alleys, and driveways. Chapter 3 provides guidelines for streets with the intent of creating a street hierarchy and providing continuity. Section 3.3 includes specific standards for the streetscape zone (public service easement).

Vineyard Avenue Corridor Specific Plan

The Vineyard Avenue Corridor Specific Plan includes the 384-acre area along Vineyard Avenue in southeast Pleasanton. The Vineyard Avenue Corridor Specific Plan establishes a unique environment which includes a variety of agricultural, residential, open space, recreational, educational, and other uses. Section 5 includes objectives, policies, and guidelines regarding transportation, including street design standards and guidelines, transit service, quarry truck traffic, and pedestrian/bicycle, equestrian trails.

Climate Action Plan 2.0

CAP 2.0 outlines local actions to reduce GHG emissions, enhance environmental sustainability, and prepare for climate change. One of its objectives is to create a qualified CAP under CEQA that complies with current regulations that allows projects to streamline future analyses. CAP 2.0 specifies the following strategies and actions which are applicable to the Housing Element Update:

Strategy TLU-3 Advance sustainable land use: Since Pleasanton’s population and job base is expected to increase, General Plan Housing Element implementation and LEED™ ND will be essential to support not only responsible community development but reduce VMT and provide access to active and/or shared transportation. This strategy will prioritize housing near transit and job centers and encourage sustainable land development for new projects that get built. Current hurdles to active and public transit include convenience and accessibility linked to land use patterns in Pleasanton. Some of these issues can be solved for future development through conscious efforts to develop with sustainable principles from plan concept to implementation.

Action E6 Housing Element implementation: The City will continue to support General Plan Housing Element implementation including aiming to achieve a balance between jobs and housing. This action includes working with regional partners to prevent displacement and increase affordable housing, and encouraging transit-oriented development near BART stations, along transportation corridors, and in business parks/near employment hubs.

Complete Streets Plan

The City of Pleasanton’s Complete Streets Policy was developed to provide guidance for its residents, decision makers, staff, and various partners to ensure that multimodal elements are incorporated into all transportation improvement projects. The following goals are identified in the Complete Streets Policy and are relevant to the Housing Element Update:

Goal 2 To incorporate the principles in this policy into all aspects of the transportation project development process, including project identification, scoping procedures, and design approvals, as well as design manuals and performance measures.

Goal 3 To create a comprehensive, integrated and connected transportation network that supports compact, sustainable development.

Fire Safety Ordinances

The Subdivision Ordinance, Chapter 19.36, of the Pleasanton Municipal Code (Municipal Code) establishes standards for roadway dimensions, subdivision layout, and public improvements needed to protect public safety. In addition, all new developments are reviewed by City departments for their potential effects on public safety, and conditions of approval are attached to minimize such effects and inspections are conducted to ensure proper installation. Developments located outside the 5-minute response time areas are required to provide additional fire mitigation measures, which include, at a minimum, automatic fire sprinkler systems (see Municipal Code Section 20.10.050 California Residential Code (CRC) Section R313 amended – Automatic Fire Sprinkler Systems).

3.14.4 - Project Impacts and Mitigation Measures

Significance Criteria

The City is using Appendix G of the State CEQA Guidelines as thresholds of significance for the Housing Element Update. To determine whether impacts related to transportation are significant environmental effects, the following questions are analyzed and evaluated. Would the Housing Element Update:

- Conflict with a program plan, ordinance or policy of the circulation system, including transit, roadway, bicycle and pedestrian facilities?
- Conflict or be inconsistent with CEQA Guidelines Section 15064.3, subdivision (b)?
- Substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?
- Result in inadequate emergency access?

Approach to Analysis

CEQA Guidelines Section 21099(b)(2) further provides that “[u]pon certification of the guidelines by the Secretary of the Natural Resources Agency pursuant to this section, automobile delay, as described solely by level of service or similar measures of vehicular capacity or traffic congestion, *shall not be considered a significant impact on the environment* pursuant to [CEQA], except in locations specifically identified in the guidelines, if any.” (Italics added.)

Pursuant to SB 743, the Natural Resources Agency promulgated CEQA Guidelines Section 15064.3 in late 2018. It became effective in early 2019 and applied Statewide beginning July 1, 2020. Subdivision (a) of that section provides that “generally, vehicle miles traveled is the most appropriate measure of transportation impacts. For the purposes of this section, ‘vehicle miles traveled’ refers to the amount and distance of automobile travel attributable to a project. Other relevant considerations may include the effects of the project on transit and non-motorized travel. Except as provided in subdivision (b)(2) [regarding roadway capacity], a project’s effect on automobile delay shall not constitute a significant environmental impact.”

This analysis evaluates the Housing Element Update based on OPR’s guidance.

The following thresholds are used to determine whether the Housing Element Update would have a significant impact on VMT (i.e., be inconsistent with CEQA Guidelines Section 15064.3, Subdivision (b)):

- **Residential Projects:** for residential projects, a VMT impact would be considered less than significant if its home-based VMT per resident¹² is at least 15 percent below the Alameda County average home-based VMT per resident.

¹² Home-based VMT only includes VMT from trips that start or end at a residence.

- **Land Use Plans:** for land use plans (including the Comprehensive Plan, Precise Plans, and Specific Plans), a VMT impact would be considered less than significant if its total VMT per service population¹³ is at least 15 percent below the Alameda County average total VMT per service population. Given their expected timeline, these types of plans only require a cumulative year analysis.

As the Housing Element Update is both a residential project and an overall land use plan, under these criteria, the Housing Element Update's effects on both residential home-based VMT per resident and total VMT per service population are provided.

Project Screening

Screening thresholds can be used to identify individual projects expected to cause a less than significant impact without conducting a detailed evaluation. In the case of land use plans, since they affect a larger area and serve as the basis for environmental analysis of future projects, they are not subject to screening and require specific VMT analysis. Therefore, the screening criteria do not apply to the Housing Element Update, but are provided for informational purposes.

- **Projects Located in Low VMT Areas:** Residential and employment-generating projects located within a low VMT-generating area are presumed to have a less than significant impact absent substantial evidence to the contrary. For residential projects, a low VMT area is defined as an area with baseline home-based VMT per resident that is 85 percent or less of the existing Alameda County average. For employment projects, a low VMT area is defined as an area with baseline employment home-based-work VMT per employee that is 85 percent or less of the baseline Alameda County average. For mixed-use projects, each component of it is considered separately; therefore, each of a project's individual land uses should be compared to the screening criteria.
- **Transportation Projects:** transit projects and bicycle and pedestrian projects that do not lead to an increase in VMT are considered to have a less than significant impact.
- **Proximity to Regional Transit Stop:** Projects located within a transit priority area, which includes areas within 0.5-mile of a regional transit stop (i.e., BART and/or Altamont Corridor Express station). This exemption does not apply to projects that:
 - Have a floor area ratio (FAR) of less than 0.75;
 - Include parking in excess of City requirements;
 - Are not consistent with applicable Sustainable Communities Strategies (SCS);¹⁴ or
 - Results in a net reduction of multi-family units

¹³ Service population is the number of residents plus the number of jobs supported by a project.

¹⁴ For the City of Pleasanton, the relevant SCS document is the Plan Bay Area 2050, Association of Bay Area Governments and Metropolitan Transportation Commission, May 2021.

Analysis Scenarios

Because the Housing Element Update is not excluded from VMT analysis through the screening process, it is subject to a VMT analysis to determine whether it has a significant VMT impact. The analysis scenarios and significance assessment are described below.

The following scenarios are addressed in the VMT analysis. Note that the OPR guidance recommends that area-wide plans such as Housing Elements are to be evaluated against cumulative conditions. For this analysis, home-based VMT per resident and total VMT per service population are evaluated under future (2040) conditions.

- **2040 No Project Conditions:** The most current version of the Year 2040 Alameda CTC Model was run to determine the 2040 No Project home-based VMT per resident and total VMT per service population for Alameda County. This No Project condition establishes the future baseline threshold VMT.
- **2040 No Housing Element Update Conditions:** This model run provides the vehicle miles generated by the potential sites for housing without any of the changes included in the Housing Element Update.
- **2040 Plus Project Conditions:** The proposed additional residential units were added¹⁵ to the 2040 No Project model for the relevant Traffic Analysis Zones (TAZs), and a full 2040 Plus Project model run was performed.

Dublin-Pleasanton Bay Area Rapid Transit Station Property

Although the Dublin-Pleasanton BART station property is not included as a potential site for rezoning and was analyzed in the Supplemental EIR for the City of Pleasanton Housing Element and Climate Action Plan General Plan Amendment and Rezonings (State Clearinghouse No. 2011052002), the model assumes the incremental increase in allowable residential units (306 units) over that previously analyzed.

Alameda CTC Countywide Transportation Plan

As described in more detail above, priority projects and programs to be prioritized over the next 10 years are identified under the CTP. This list includes seven projects located in the city:

- I-680 Express Lanes: SR-84 to Alcosta (Phase 1–Southbound)
- I-580/I-680 Interchange (Phase 1)
- Dublin-Pleasanton BART Station Active Access Improvements
- I-580/Fallon/El Charro Interchange Modernization (Phase 2)
- Iron Horse Trail Improvements
- I-680 Sunol Interchange Modernization
- West Las Positas Bike Corridor Improvements

¹⁵ To provide an accurate analysis, the City determined which uses were likely to be removed to accommodate the proposed residential units on the potential sites for rezoning.

The transportation analysis provided in this Draft Program EIR utilizes land use data from the Alameda CTC Model version released in May 2019 that assumes these transportation network improvements.

Modeling Procedure

This analysis uses the Alameda CTC Model to estimate the home based VMT per resident and the total VMT per service population generated by the Housing Element Update under cumulative (i.e., 2040) conditions. The Alameda CTC Model uses various socioeconomic variables, such as number of households and residents by household type and number of jobs by employment category at a TAZ level, in addition to transportation system assumptions, such as type of roadway, number of lanes, major bicycle, and pedestrian facilities, and transit service capacity and frequency, to forecast various travel characteristics.

The Alameda CTC Model uses a four-step modeling process that consists of (1) trip generation, (2) trip distribution, (3) mode split, and (4) trip assignment. This process accounts for changes in travel patterns due to future growth and expected changes in the transportation network. The Alameda CTC Model assigns all predicted trips within, across, to, or from the nine-county San Francisco Bay Area region to the roadway network and transit system by mode (i.e., single-occupant or carpool vehicle, biking, walking, or transit) and transit carrier (i.e., bus or rail) for a given scenario. The VMT generated by each TAZ can be estimated by tracking the number of trips and the length of each trip generated by the TAZ; the VMT per resident can be estimated by dividing the total VMT generated by the residential uses by the number of residents in that TAZ.

The Alameda CTC Countywide Travel Demand Model (Alameda CTC Model) version released in May 2019 incorporates land use data and transportation network improvements consistent with Plan Bay Area 2040 (i.e., the SCS). The Plan Bay Area 2040 land use databases were modified to reflect the buildout consistent with the Housing Element Update. Although MTC adopted Plan Bay Area 2050 in October 2021, this Draft Program EIR relies on the version of the Model consistent with Plan Bay Area 2040 because the Alameda CTC has not yet updated the Alameda CTC Model to be consistent with Plan Bay Area 2050.

Impact Evaluation

Affect to Circulation System

Impact TRANS-1: Development consistent with the Housing Element Update, rezonings, General Plan and Specific Plan Amendments would not conflict with a program plan, ordinance or policy of the circulation system, including transit, roadway, bicycle and pedestrian facilities.

Future potential development consistent with the Housing Element Update would contribute to and increase use of transit, bicycle, and pedestrian facilities in the city. Development consistent with the Housing Element Update is not forecasted to generate transit, bicycle, or pedestrian use that would exceed the capacity of area facilities to serve that demand. Development consistent with the Housing Element Update would be required to adhere to all applicable General Plan goals, policies, and programs and applicable goals, policies, and programs included in the Hacienda Design Guidelines and Vineyard Avenue Corridor Specific Plan. Additionally, development projects

consistent with the Housing Element Update would be subject to all applicable City guidelines, standards, and specifications related to the circulation systems, including transit, bicycle, or pedestrian facilities. Specifically, any modifications to or new transit, bicycle, and pedestrian facilities would be subject to and designed in accordance with all applicable federal, State, and local policies.

General Plan Policy 4 in the Land Use Element strictly states that all development must be consistent with the General Plan Land Use Map. Policy 9 supports the development and infill of new housing in areas conveniently located near transportation hubs or local commercial areas. Both policies are listed under Goal 2 which encourages a well-rounded community to maintain desirable neighborhoods, support growing employment, and host a variety of community facilities. General Plan Goal 3 in the Land Use Element promotes development occurring in an efficient, logical, and orderly fashion. In more detail, Policy 23 emphasizes the importance of regulating the number of housing units approved each year with the goal of adequately planning infrastructure to ensure a predictable growth rate for the city's residents.

Goal 6 of the Housing Element Update specifically addresses the intent of the City to plan to ensure new housing is developed in a manner that reduces environmental impacts, keeps pace with available infrastructure and services, and improves the quality of life for existing and new residents. To accomplish this goal, Policy 6.5 encourages new housing to be located in areas well-served by public transit and the active transportation network. The new programs included in the Housing Element Update would further this goal. For example, Program 6.2 includes improvements to bicycle amenities and increases to transit ridership. Similarly new Program 6.4 promotes more frequent bus and rail services in the city.

Development consistent with the Housing Element Update would be required to accommodate the future implementation of improvements identified in the Master Plan. These including the following improvements within or adjacent to the potential sites for housing.

- Class I shared use paths along the eastern and southern borders of Site 8 (Muslim Community Center).
- Class III bicycle boulevard on Muirwood Drive north of Site 22 (Merritt).
- Class II buffered bicycle lanes on Sunol Boulevard and Valley Avenue along the eastern and northern borders of Site 23 (Sunol Boulevard).
- Class II buffered bicycle lane on Sunol Boulevard along the western border of Site 24 (Sonoma Drive Area).
- Class II buffered bicycle lanes on Sunol Boulevard and Bernal Avenue along the western and southern borders of Site 25 (PUSD-District).
- Class II buffered bicycle lane on Bernal Avenue along the southeast border of Site 26 (St. Augustine).
- Class I shared use path along the western border of Site 27 (PUSD-Vineyard).
- Class IV separated bikeway along the southern border of Site 29 (Oracle).

Development consistent with the Housing Element Update would also comply with Action E6 of the CAP 2.0, which aims to achieve a balance between jobs and housing, increase affordable housing, and encourage new development with accessibility to transit options and employment hubs.

Because development consistent with the Housing Element Update would be subject to all applicable City guidelines, standards, and specifications, it would not conflict with adopted policies, plans, or programs. Therefore, the Housing Element Update would result in a less than significant impact on the circulation system, including transit, bicycle, and pedestrian facilities and policies.

Level of Significance

Less than significant impact.

Vehicle Miles Traveled

Impact TRANS-2: Development consistent with the Housing Element Update, rezonings, and General and Specific Plan Amendments would conflict or be inconsistent with CEQA Guidelines Section 15064.3, subdivision (b).

This analysis uses the Alameda CTC Model to estimate VMT, and baseline VMT for Alameda County is provided in Table 3.14-1. As previously discussed, because development consistent with the Housing Element Update would be largely residential in nature, the thresholds pertaining to residential uses are utilized in the assessment of VMT impacts (daily home based VMT per resident). In addition, as the Housing Element Update is a land use plan, the project is also measured against the thresholds pertaining to land use plans (cumulative VMT per service population).

The baseline provided by the Alameda CTC Model, provided in Table 3.14-1, was adjusted to reflect the relevant housing unit numbers for the 2040 No Project and 2040 Plus Project Conditions, and the resulting VMT metrics were reported. Table 3.14-2 summarizes the weekday daily home-based VMT per resident for Alameda County and the VMT produced by the Housing Element sites under no project and project conditions in 2040. Table 3.14-2 also includes the threshold used to determine the significance of the VMT impact, defined as 15 percent below the Alameda County average. Table 3.14-3 provides the home-based VMT per resident by site. Table 3.14-4 shows the total VMT per service population for the same geographies and scenarios as provided in Table 3.14-2.

Table 3.14-2: Home-Based VMT per Resident Summary (2040)

VMT Area	Home-Based VMT per Resident	
	2040 No Project	2040 Plus Project
Alameda County Average	17.6	17.8
Threshold of significance (85% of Alameda County’s 2040 Average)	15.0	15.0
Potential Sites for Housing	24.6	22.3
Notes: HEU = Housing Element Update VMT = Vehicle Miles Traveled		

Table 3.14-3: Home-Based VMT per Resident by Potential Site for Rezoning (2040)

Housing Element Sites		Home-Based VMT per Resident		HEU >85% of Alameda County Average?
Site Number-Name	Maximum Proposed Capacity (Units)	85% of 2040 No Project Alameda County Average	2040 Plus Project	
1–Lester	31	15.0	33.6	Yes
2–Stoneridge Shopping Center (Mall)	1,440	15.0	17.8	Yes
3–PUSD–Donlon	28	15.0	23.7	Yes
4–Owens (Motel 6 and Tommy T)	94	15.0	18.6	Yes
5–Laborer Council	54	15.0	17.3	Yes
6–Signature Center	440	15.0	19.6	Yes
7–Hacienda Terrace	80	15.0	19.2	Yes
8–Muslim Community Center	125	15.0	22.6	Yes
9–Metro 580	375	15.0	20.2	Yes
11–Old Santa Rita Area	1,311	15.0	14.9	No
12–Pimlico Area (north side)	85	15.0	24.7	Yes
14–St. Elizabeth Seton	51	15.0	22.3	Yes
15–Rheem Drive Area (southwest side)	137	15.0	22.3	Yes
16–Tri-Valley Inn	62	15.0	23.1	Yes
18–Valley Plaza	220	15.0	23.1	Yes
19–Black Avenue	65	15.0	24.0	Yes
20–Boulder Court	378	15.0	25.1	Yes
21a–Kiewit	200	15.0	25.1	Yes
21b–Kiewit	560	15.0	25.1	Yes
22–Merritt	91	15.0	31.6	Yes
23–Sunol Boulevard	956	15.0	26.7	Yes
24–Sonoma Drive Area	163	15.0	30.8	Yes
25–PUSD–District	163	15.0	24.5	Yes
26–St. Augustine	29	15.0	25.6	Yes
27–PUSD–Vineyard	25	15.0	39.9	Yes
29–Oracle	225	15.0	18.7	Yes

Notes:
HEU = Housing Element Update
PUSD = Pleasanton Unified School District
VMT = Vehicle Miles Traveled

Table 3.14-4: Total VMT per Service Population Summary (2040)

VMT Area	Total VMT per Service Population	
	2040 No Project	2040 Plus Project
Alameda County Average	25.9	26.0
Threshold of Significance (85% of 2040 No Project Alameda County Average)	22.0	22.0
Potential Sites for Housing	36.9	30.5
Notes: HEU = Housing Element Update VMT = Vehicle Miles Traveled		

As shown in Table 3.14-2, development consistent with the Housing Element Update is estimated to reduce the home-based VMT per resident. with an average of 22.3 VMT per resident in 2040. This does not result in the VMT being below the threshold of significance of 15.0 (i.e., 15 percent below the Alameda County 2040 No Project Average home-based VMT per capita). Although development consistent with the Housing Element Update as a whole would result in a home-based VMT per resident reduction, the average does not drop below the threshold of significance, as shown in Table 3.14-2, and almost all of the sites are above the threshold of significance as shown in Table 3.14-3.

As shown in Table 3.14-4, development consistent with the Housing Element Update would reduce the VMT per service population for the potential sites for housing by about 17 percent, from 36.9 to 30.5. However, the VMT of 30.5 for the potential sites for housing is above the threshold of significance of 22.0, indicating a significant impact related to VMT.

Mitigation Measure (MM) TRANS-2 requires individual housing project development proposals that do not screen out from a VMT impact analysis to provide a quantitative VMT analysis using the methodology used for this Draft Program EIR analysis and, if results indicate the VMT associated with the individual housing project would be above the threshold, it would be required to include VMT reduction measures. Projects which result in a significant impact may implement Transportation Demand Management (TDM) measures and physical measures to reduce VMT. The measures would not be additive and combining the reduction measures reduces their effectiveness resulting in a cap on the total VMT reduction these measures can provide. Because the effectiveness of the VMT reduction measures in reducing an individual development project’s VMT impact to a less than significant level cannot be confirmed in this analysis, the impact would remain significant and unavoidable with mitigation.

Level of Significance Before Mitigation

Potentially significant impact.

Mitigation Measures

MM TRANS-2 Implement Vehicle Miles Traveled Reduction Measures. Prior to the issuance of entitlements for a project, project applicants for individual housing project

development proposals that do not screen out from Vehicle Miles Traveled (VMT) impact analysis shall provide a quantitative VMT analysis using the methods applied in this Draft Program EIR, with modifications as necessary (e.g., to account for project-specific information and/or to reflect future updates to the Alameda Countywide Travel Demand [Alameda CTC] Model) and reduce VMT impacts to less than the applicable VMT thresholds.

Level of Significance After Mitigation

Significant and unavoidable with mitigation.

Roadway Safety Hazards

Impact TRANS-3: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment).

As a program-level analysis, this Draft Program EIR considers the reasonably anticipated environmental effects related to the implementation of the Housing Element Update and associated land use and planning revisions. The analysis in this Draft Program EIR does not examine the site-specific effects of individual projects that would directly contribute to roadway safety hazards. The purpose of the Housing Element Update is to ensure that the City's housing needs are met in a safe and cohesive manner. As such, the programs and policies in the Housing Element Update promote safe design and encourage compatible development. Subsequent projects consistent with the Housing Element Update, including any new associated roadway, bicycle, pedestrian, and transit infrastructure improvements, would be subject to, and designed in, accordance with City standards and specifications which would address potential design hazards including sight distance, driveway placement, and signage and striping. Additionally, any new transportation facilities, or improvements to such facilities associated with subsequent projects consistent with the Housing Element Update, would be constructed based on industry design standards and best practices consistent with the Municipal Code and building design and inspection requirements. The City's evaluation of individual projects' access and circulation would incorporate analysis with respect to City standards for vehicular LOS and queueing, as well as for service to pedestrians, bicyclists, and transit users. Therefore, development consistent with the Housing Element Update would result in a less than significant impact to roadway safety hazards.

Level of Significance

Less than significant impact.

Emergency Access

Impact TRANS-4: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not result in inadequate emergency access.

The Housing Element Update does not propose or confer any specific development projects. Therefore, there are no specific development projects associated with Housing Element Update; and thus, specific housing sites developed consistent with the Housing Element Update cannot be

analyzed for adequacy of emergency access at this time. However, the City maintains the roadway network which would provide access to the potential sites for housing in accordance with industry design standards. Pursuant to the Subdivision Ordinance, Chapter 19.36, of the Municipal Code, emergency access to the potential sites for housing would be subject to review by the City and responsible emergency service agencies, thus ensuring projects would be designed to meet all emergency access and design standards. The City also requires the preparation of construction management plans that would minimize temporary obstruction of traffic during site construction.

Additional vehicles associated with development at the potential sites for housing could increase delays for emergency response vehicles during peak commute hours. However, emergency responders maintain response plans which include use of alternate routes, sirens, and other methods to bypass congestion and minimize response times. In addition, California law requires drivers to yield the right-of-way to emergency vehicles and remain stopped until the emergency vehicle passes to ensure the safe and timely passage of emergency vehicles.

Therefore, adequate emergency access would be provided to the potential sites for housing, and the impact would be less than significant.

Level of Significance

Less than significant impact.

3.14.5 - Cumulative Impacts

The geographic scope of the cumulative impact analysis for transportation is the City of Pleasanton as well as the surrounding cities of Livermore, Dublin, and San Ramon and the Town of Danville. This analysis evaluates whether the impacts of the Housing Element Update, together with the impacts of cumulative development, would result in a cumulatively significant impact related to transportation. This analysis then considers whether incremental contribution to cumulative impacts associated with the implementation of the Housing Element Update would be significant. Both conditions must apply for a project's cumulative effects to rise to a level of significance.

Circulation System

Cumulative projects in the Tri-Valley area would be required to provide adequate public transit, bicycle, and pedestrian facilities and comply with the programs and policies supporting alternative transportation in planning level documents. Accordingly, there is a less than significant cumulative impact to the circulation system, including transit, bicycle, and pedestrian facilities.

As described under Impact TRANS-1, while the Housing Element Update would generate new demand for public transit, bicycle, and pedestrian facilities that serve the area, development consistent with the Housing Element Update would be required to adhere to all applicable General Plan goals, policies, and programs and applicable goals, policies, and programs included in the Hacienda Design Guidelines, Vineyard Avenue Corridor Specific Plan. Additionally, development projects consistent with the Housing Element Update would be subject to all applicable City guidelines, standards, and specifications related to the circulation systems, including transit, bicycle, or pedestrian facilities. Specifically, any modifications to or new transit, bicycle, and pedestrian

facilities would be subject to and designed in accordance with all applicable federal, State, and local policies. Therefore, development consistent with the Housing Element Update, in conjunction with other planned and approved projects, would not have a cumulatively significant impact related to the circulation system, including transit, bicycle, and pedestrian facilities.

Vehicle Miles Traveled

Cumulative projects in Alameda County may generate additional VMT, which would be added to the roadway network within the geographic context. All cumulative projects would be required to comply with applicable federal, State, and local policies and ordinances and General Plan and Specific Plan programs and policies that address VMT, as well as mitigate their fair share of impacts related to VMT.

Although development consistent with the Housing Element Update as a whole would result in a reduction in home-based VMT per resident it does not drop below the threshold of significance. As shown in Table 3.14-4, although development consistent with the Housing Element Update would reduce total VMT per service population by about 17 percent, from 36.9 to 30.5, the VMT would remain above the thresholds of significance of 22.0, indicating a significant impact related to VMT. MM TRANS-2 requires individual housing project development proposals in the city that do not screen out from a VMT impact analysis to provide a quantitative VMT analysis using the methodology used for this Draft Program EIR, with modifications as necessary, and analysis as part of the development application, and, if results indicate the VMT associated with the individual housing project would be above the applicable threshold, it would be required to include VMT reduction measures. However, even with incorporation of MM TRANS-2, which would partially reduce VMT impacts, the impacts associated with the Housing Element Update as a whole would remain significant and unavoidable. Therefore, development consistent with the Housing Element Update would result in a significant and unavoidable VMT impact and the Housing Element Update's incremental contribution to the cumulative impact is significant; therefore, development consistent with the Housing Element Update's contribution to cumulative VMT impacts would remain cumulatively considerable even with implementation of identified mitigation measures, resulting in a significant and unavoidable cumulative impact related to VMT.

Roadway Safety and Emergency Access

Impacts related to roadway safety and emergency access associated with design features are generally site specific. The relevant local jurisdictions' engineering, fire and planning departments would review project plans prior to construction permits in order to determine whether any construction traffic control plans would be required and would require the implementation of same, as necessary. All cumulative projects would be required to mitigate for their impacts and ensure that roadway safety and emergency access is maintained and comply with applicable policies in local and regional planning documents. Therefore, impacts would be less than significant.

As discussed under Impact TRANS-3, development consistent with the Housing Element Update would be subject to and designed in accordance with City standards and specifications which would address potential design hazards including sight distance, driveway placement, and signage and striping. Additionally, any new transportation facilities, or improvements to such facilities, associated

with subsequent projects consistent with the Housing Element Update would be constructed based on industry design standards and best practices consistent with the Municipal Code and building design and inspection requirements. The City's evaluation of projects' access and circulation would incorporate analysis with respect to City standards for vehicular LOS and queueing, emergency response access, as well as for service to pedestrians, bicyclists, and transit users. Therefore, development consistent with the Housing Element Update, in conjunction with other planned and approved projects, would not have a cumulatively significant impact related to roadway safety or emergency access.

Level of Cumulative Significance Before Mitigation

Potentially significant cumulative impact with respect to VMT.

Cumulative impacts related to circulation, roadway safety, and emergency access are less than significant.

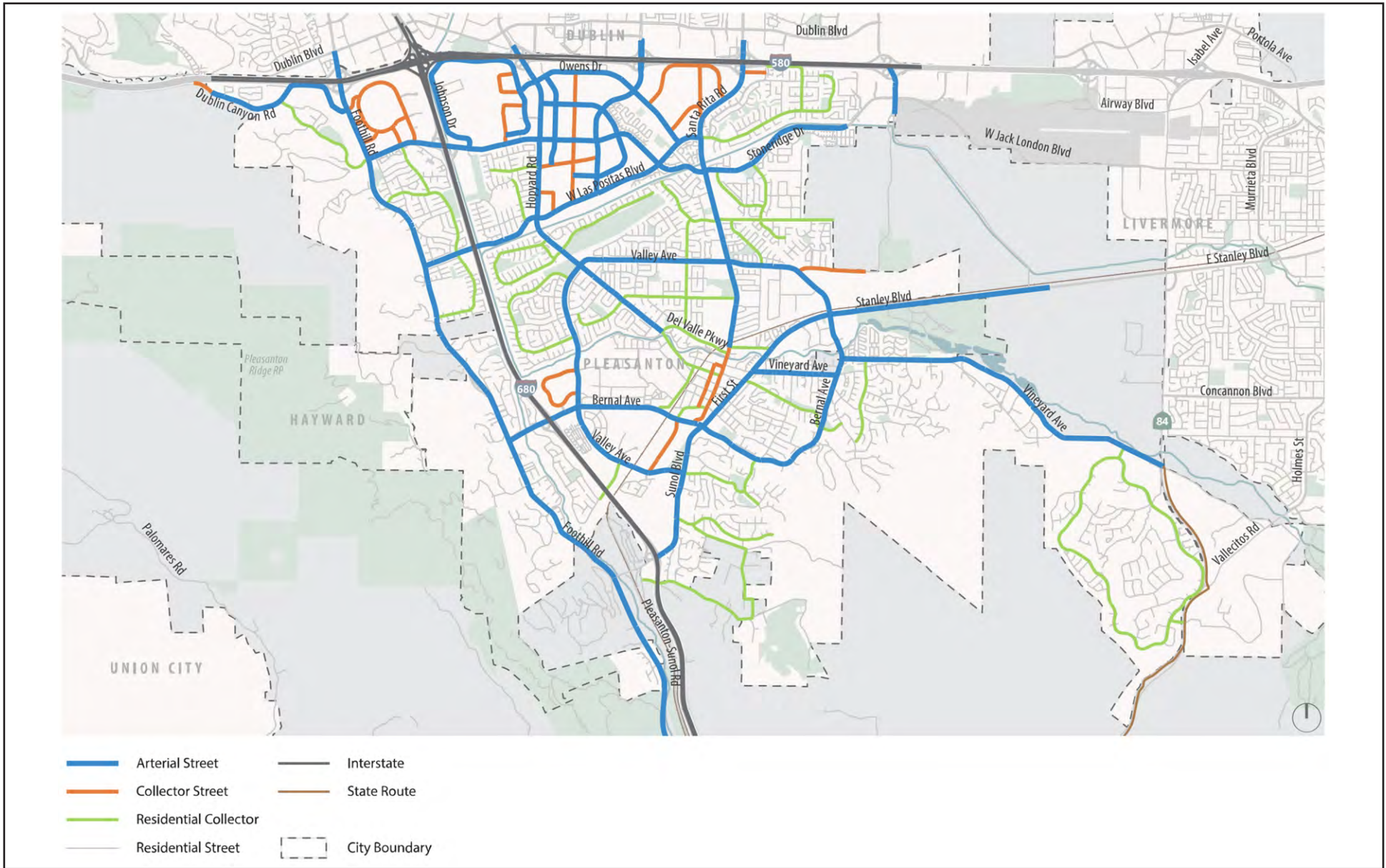
Cumulative Mitigation Measures

Implement MM TRANS-2.

Level of Cumulative Significance After Mitigation

Development consistent with the Housing Element Update would result in a significant and unavoidable cumulatively considerable contribution to the existing cumulative VMT impact even with mitigation incorporated. Even with incorporation of MM TRANS-2, the City may not achieve the overall VMT threshold reduction level due to uncertainty in the cumulative effectiveness TDM measures as well as unknowns related to transit service levels, transportation technology, and travel behavior. Moreover, these policies and mitigation measures primarily apply to new developments; existing land uses that have already been approved and are under construction are generally not affected. Because of the programmatic nature of the Housing Element Update, no additional mitigation measures are available, and the impact is considered significant and unavoidable.

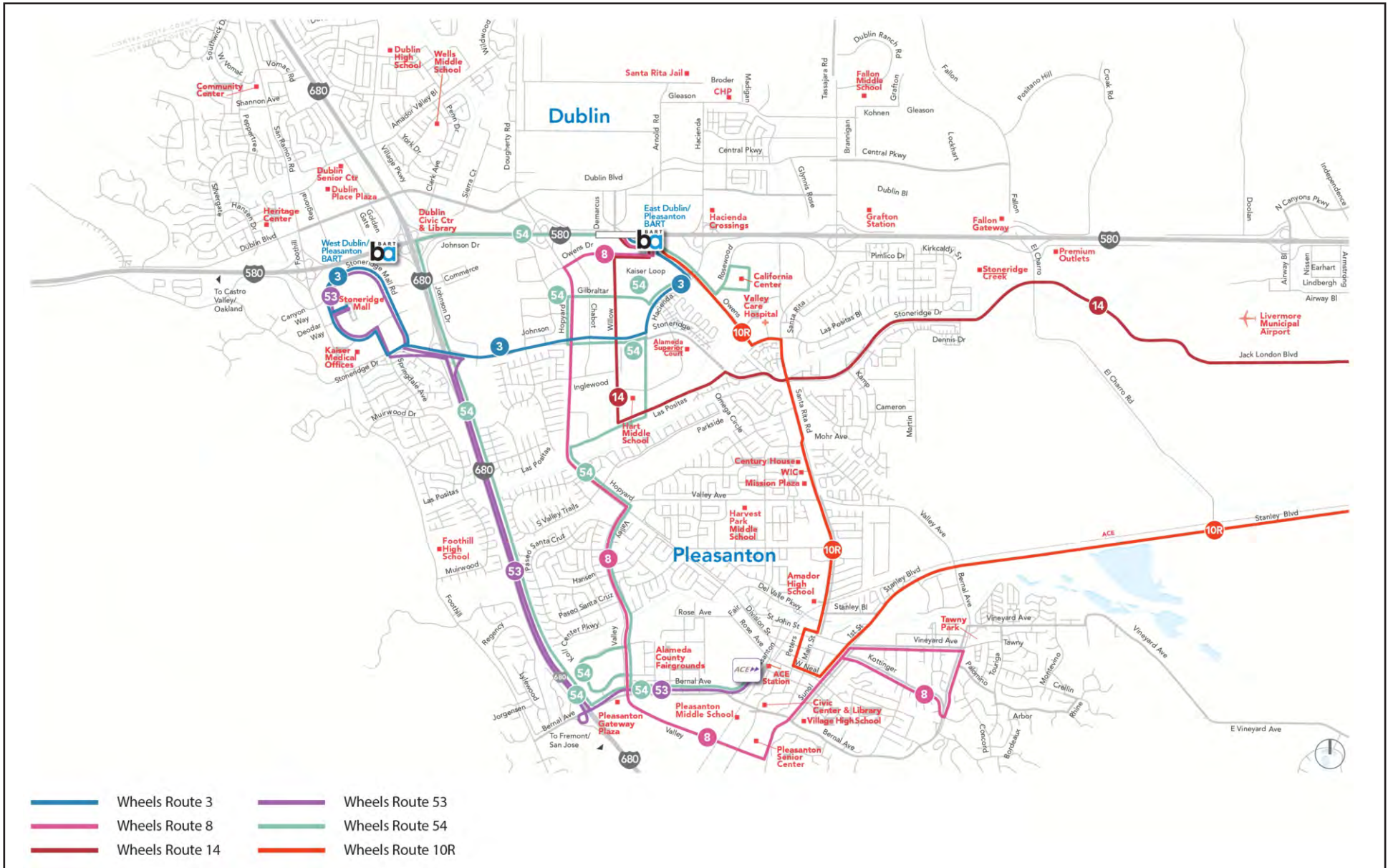
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Source: Fehr & Peers, 2022.

Figure 3.14-1
Existing Roadway Network

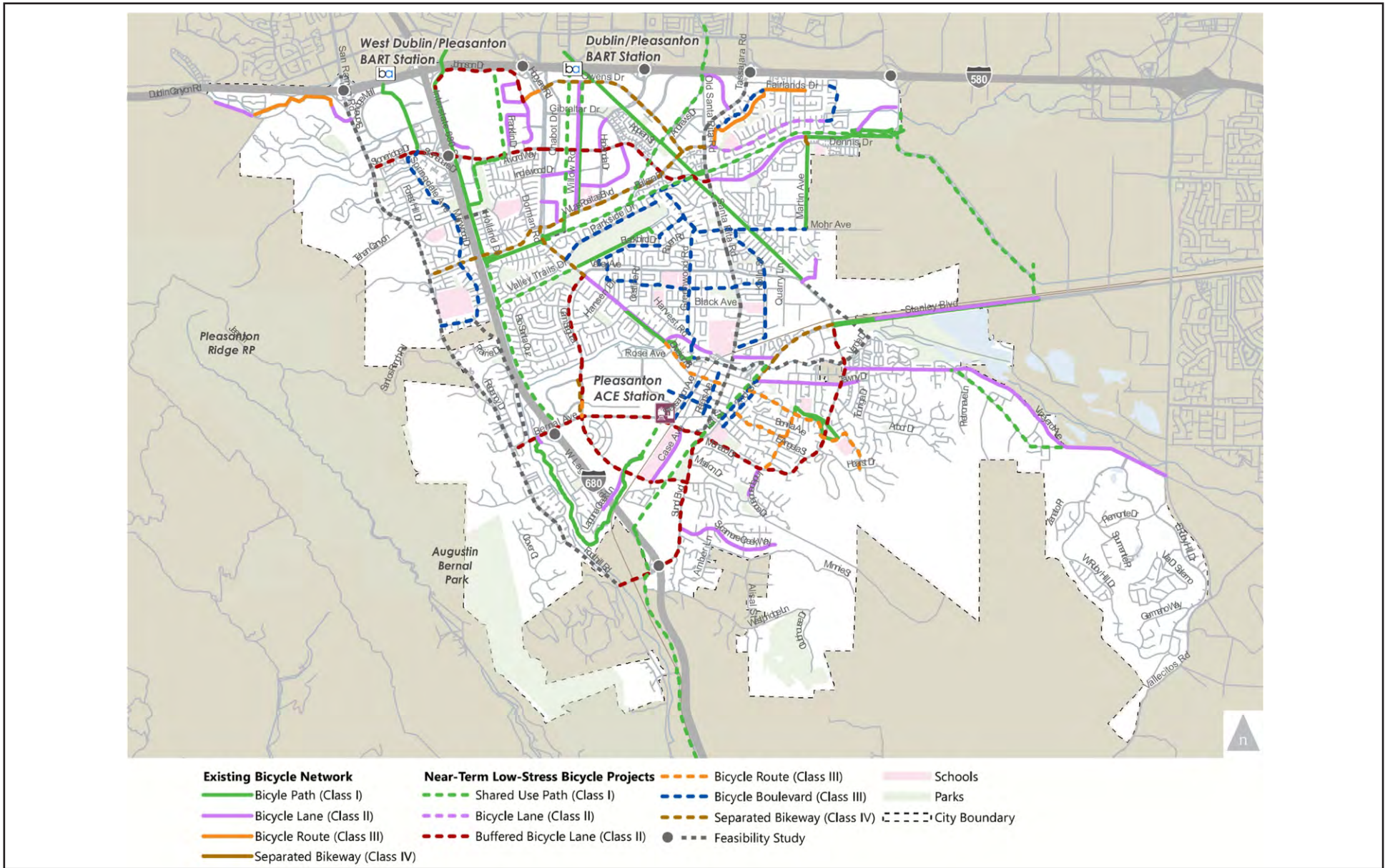
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Source: Fehr & Peers, 2022.

Figure 3.14-2
Transit Network

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Source: Fehr & Peers, 2022.

Figure 3.14-3 Existing And Proposed Bicycle Facilities

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3.15 - Utilities and Service Systems

3.15.1 - Introduction

This section describes the existing conditions related to utilities and service systems (water, wastewater, stormwater, solid waste, electric power, natural gas, and telecommunications facilities) as well as the relevant regulatory framework. This section also evaluates the possible impacts related to such utilities and service systems that could result from implementation of the proposed 2023-2031 (6th Cycle) Housing Element Update, rezonings, General Plan and Specific Plan Amendments (collectively referred to herein as the Housing Element Update). Future projects consistent with the Housing Element Update will be evaluated for project-specific impacts related to utilities and service systems at the time they are proposed.

Descriptions and analysis in this section are based, in part, on a review of the City of Pleasanton General Plan (General Plan), Vineyard Avenue Corridor Specific Plan, and the Pleasanton Municipal Code (Municipal Code). Once the Housing Element Update is adopted, the General Plan would be amended to include the Housing Element Update. Therefore, all references to the General Plan include the Housing Element Update. The Water Supply Assessment (WSA) prepared by Watearth for the Housing Element Update completed in October 2022, the 2020 Urban Water Management Plan (2020 UWMP) dated June 2021, and the California Department of Resources Recycling and Recovery (CalRecycle) website also provide foundational information for the setting and analysis in this section.

3.15.2 - Environmental Setting

Potable Water

As a water retailer, the City of Pleasanton (City) provides water service to areas within the city limit line as well as the areas of adjacent unincorporated Alameda County, including Remen Tract, Happy Valley Road and Kilkare Canyon Road, and the area west of Foothill Road (Figure 3-1 in the 2020 UWMP).¹ This existing water service area lies within the Alameda Creek Watershed Area. Overall, the service area is approximately 25 square miles.

The City has two water supply systems: purchased water from Zone 7 Water Agency (Zone 7), and groundwater from the Livermore Valley Main Groundwater Basin. The water distribution system consists of approximately 327 miles of pipelines and 22,369 water service connections. The Pleasanton Utilities Division operates 14 pump stations and 22 water storage reservoirs, spread throughout the city. In addition, Pleasanton owns and operates three groundwater wells, which have been used to augment Zone 7 supply.² The population served by the City as water supplier is expected to grow by 22 percent by 2045, as shown in Table 3.15-1.

¹ City of Pleasanton. 2021. 2020 Urban Water Management Plan (2020 UWMP). June.

² Ibid.

Table 3.15-1: Water Service Population—Current and Projected (2020-2045)

2020	2025	2030	2035	2040	2045 (opt)
82,977	86,326	91,430	96,171	100,913	100,913

Source: City of Pleasanton. 2021. 2020 Urban Water Management Plan. Pleasanton. June.

Zone 7 Water Agency

Service Area

Zone 7 is the City's sole wholesale treated water supplier. Zone 7 distributes its water supplies to cities, water retailers, and unincorporated areas within the Tri-Valley area. Zone 7 serves the cities of Pleasanton, Dublin, Livermore, and southern portions of San Ramon through four retail water suppliers: the City of Pleasanton, Dublin San Ramon Services District, City of Livermore, and California Water Service Company of Livermore.³

Currently, the City purchases all potable water required within the service area from Zone 7, except for groundwater, described in more detail below, extracted from three groundwater well locations. As described in more detail in Section 3.9, Hydrology and Water Quality, and below, given new per- and polyfluoroalkyl substances (PFAS) regulations from the California Environmental Protection Agency (Cal/EPA), it has been determined that all groundwater supply wells for the city may be taken out of commission no later than the first quarter of 2023. The City is currently considering several options to account for the loss of water supply, including PFAS treatment and wells rehabilitation as well as additional purchases from Zone 7. As of the date of this Draft Program EIR, the City is evaluating options but no specific alternative supply source has been identified.

Approximately 80 percent of the City's potable water is purchased from Zone 7. Therefore, Zone 7 has two critical factors in water supply: incoming water supply through contracts, rights and accumulated water supply in storage from previous years. Zone 7 has incoming supply primarily from imported surface water and local surface runoff water. In addition, accumulated water supplies are available in local and non-local storage locations. The remaining 20 percent of potable water supplied to the City has been obtained by groundwater pumping of the Livermore Valley Main Groundwater Basin (Main Basin).

Potable Water Supply Assessment

Potable and recycled water sources, supply, demand, and use have been described separately below.

Potable Water Source and Supply

Purchased Surface Water

Zone 7 currently derives approximately 80 percent of its water supply from the State Water Project, with water from the South Bay Aqueduct, surface runoff collected in the Del Valle Reservoir, with local groundwater representing the remaining supply (20 percent). Water delivered to Pleasanton comes primarily from the State Water Project. The 2020 UWMP concluded that Zone 7 can supply

³ City of Pleasanton. 2021. 2020 Urban Water Management Plan (2020 UWMP). June.

100 percent of water demand in all conditions, including drought, up to the 2045 projections as shown in Table 3.15-2. Zone 7 is also engaging in future water supply projects, including the Bay Area Regional Desalination Project, Delta Conveyance Project, Potable Water Reuse, and the Proposed Sites Reservoir. These projects are projected to provide a cumulative additional water supply of over 1,500,000 acre-feet per year (AFY) (Appendix H).⁴

Table 3.15-2: Pleasanton Projected Potable Water Supply (2020-2045)

Projected Water Supply (AFY)							
Water Supply	Water Supply Description	2020	2025	2030	2035	2040	2045
Purchased Water	Zone 7	11,752	13,240	13,739	14,237	14,736	14,736
Groundwater	Main Basin	3,027	3,500	3,500	3,500	3,500	3,500
Total		14,779	16,740	17,239	17,737	18,236	18,236

Notes:
AFY = acre-feet per year
Source: Watearth. 2022. City of Pleasanton Water Supply Assessment (WSA) for 2023-2031 Housing Element Update. October.

Groundwater

The maximum annual groundwater pumping quota for the City is 3,500 acre-feet, limited by Zone 7.⁵ Water is treated with chlorine, ammonia, and fluoride at the well sites before entering the water distribution system.⁶ Groundwater supplies approximately 20 percent of the total potable water supply. Water is extracted from the Main Basin;⁷ the Main Basin is the sole groundwater supply for the City. The Main Basin is composed of the Castle, Bernal, Amador, and Mocho II subbasins, with an estimated total storage capacity of 254,000 acre-feet.⁸ consisting of 126,000 acre-feet of reserve storage and 128,000 acre-feet of aggregate emergency storage from all four subbasins. The City can pump up to its groundwater pumping quota from the Main Basin, which is the City’s allocation of the long-term average natural recharge to the Main Basin.⁹

Per- and Polyfluoroalkyl Substances

Per- and PFAS are a group of thousands of chemicals used since the 1940s to make commercial products including carpets, clothing, food packaging, and cookware because they are waterproof, stain-resistant, and non-stick; they also have been used in fire-retarding foam and various industrial processes. They can be introduced into the body through ingestion of contaminated food or liquid and inhaling or touching products with packaging treated with the substance. They can contaminate drinking water supplies when products containing PFAS are used or spilled on the ground and they

⁴ Watearth. 2022. City of Pleasanton Water Supply Assessment (WSA) for 2023-2031 Housing Element Update. October.
⁵ Each Zone 7 retailer has an established ground water pumping quota (GPQ), as managed by Zone 7. The City coordinates with Zone 7 on an ongoing basis to track water use.
⁶ City of Pleasanton. 2021. 2020 Urban Water Management Plan (2020 UWMP). June.
⁷ Watearth. 2022. City of Pleasanton Water Supply Assessment (WSA) for 2023-2031 Housing Element Update. October.
⁸ City of Pleasanton. 2021. 2020 Urban Water Management Plan (2020 UWMP). June.
⁹ Watearth. 2022. City of Pleasanton Water Supply Assessment (WSA) for 2023-2031 Housing Element Update. October.

migrate into groundwater, and, once in groundwater, PFAS can travel large distances and contaminate drinking water wells.

In March 2019, the California State Water Resources Control Board (State Water Board) initiated a Statewide PFAS phased investigation for hundreds of drinking water sources, including Zone 7 and the City of Pleasanton. The City has three groundwater supply wells, Wells 5, 6, and 8.¹⁰ The test results showed detection of PFAS contaminants above the Response Level for Well 8, and, upon receipt of these results, the City placed Well 8 on Emergency Standby Status and Well 8 has not been operated since the beginning of June 2019.¹¹

In September 2020, the City approved a work plan to remediate PFAS present at the City's groundwater wells, and the work plan included the establishment of the PFAS Treatment and Wells Rehabilitation Project.¹² The PFAS Treatment and Wells Rehabilitation Project is currently paused while the City evaluates a broader range of alternatives for this supply.

It has since been determined that all groundwater supply wells for the city may be taken out of commission no later than the first quarter of 2023. Currently, groundwater makes up approximately 20 percent of the total water supply for the City, and, if the existing groundwater supply wells are taken out of commission, this 20 percent will not be available to the City without treatment or additional supply sources. As noted, the City is evaluating options to replace or restore this supply.

Recycled Water

Recycled water is non-potable municipal wastewater that has been treated to a specified quality that allows for reuse generally for landscape irrigation purposes. Other forms of non-potable water, such as raw water, are not supplied to customers.¹³ All recycled water is provided by the Dublin San Ramon Services District (DSRSD) Regional Wastewater Treatment Facility (RWTF) and the Livermore Water Reclamation Plant (LWRP). Transport of recycled water is accomplished through approximately 51,000 lineal feet of pipeline ranging in diameter from 6 inches to 20 inches and 22,400 lineal feet of repurposed potable water pipeline. Construction of the City's Recycled Water Project was substantially completed by September 2016.¹⁴

Recycled Water Source and Supply

Tertiary disinfected recycled water is purchased by the City through the DSRSD. The DSRSD sources the recycled water from the RWTF and LWRP facilities, routing a portion of the secondary effluent from the RWTF plant to DSRSD's water recycling plant through DSRSD East Bay Municipal Utility District (EBMUD) Recycled Water Authority (DERWA) facilities. The City maintains the first right to use the secondary effluent produced from wastewater originating from the City's wastewater collection system for recycling. DSRSD maintains the first right to use secondary effluent produced from the DSRSD collection system for recycling. According to the 2003 DERWA Water Sales

¹⁰ The City owns and operates three active groundwater wells. The numbering of the wells is the convention used by the City.

¹¹ City of Pleasanton. 2022. PFAS FAQ. Website:

https://admin.cityofpleasantonca.gov/depts/os/water_quality/pfas_and_pfoa.asp. February 8. Accessed August 25, 2022.

¹² City of Pleasanton. 2022. PFAS Treatment and Wells Rehab Project. Website:

https://www.cityofpleasantonca.gov/depts/os/water_quality/pfas_project.asp. Accessed August 25, 2022.

¹³ City of Pleasanton. 2021. 2020 Urban Water Management Plan (2020 UWMP). June.

¹⁴ City of Pleasanton. 2021. 2020 Urban Water Management Plan (2020 UWMP). June.

Agreement, all recycled water produced by DSRSD is delivered to DERWA for subsequent delivery to the EBMUD and DSRSD water service areas. DSRSD’s tertiary treatment capacity is 16.2 million gallons per day (mgd), while the LWRP can produce up to 6.0 mgd of recycled water. Recycled water is delivered by DERWA on a first come first serve basis.¹⁵ The City connects to the DERWA system near the corner of the DSRSD Dedicated Land Disposal site, adjacent to Stoneridge Drive near the DSRSD RWTF. ¹⁶ Table 3.15-3 provides the projected recycled water supply from 2020 to 2045.

Table 3.15-3: Projected Recycled Water Supply Values from 2020-2045

Projected Water Supply (AFY)							
Water Supply	Water Supply Description	2020	2025	2030	2035	2040	2045
Recycled Water	DSRSD	1,228	1,500	1,650	1,650	1,800	1,800
Notes: AFY = acre-feet per year DSRSD = Dublin San Ramon Services District Source: Watearth. 2022. City of Pleasanton Water Supply Assessment (WSA) for 2023-2031 Housing Element Update. October.							

Recycled Water Demand and Use

Currently, recycled water is used for landscape irrigation, except for 1 acre-foot per year of recycled water used for dual plumbing.¹⁷ DSRSD coordinates with the planning departments in the cities of Dublin and San Ramon, Alameda and Contra Costa counties, and the United States Army Reserve to ensure that recycled water is used where it is available. DSRSD and EBMUD work together to manage recycled water supply demands.¹⁸ It is expected that recycled water will also be used for groundwater recharge in the future.

Water Demand

The average estimated water demand per capita is 159 gallons per capita per day (GPCD). Residential water use makes for 62 percent of all water use, while the remaining 38 percent is used in commercial, industrial, institutional development, agriculture, and landscaping. Additional water demand originates from groundwater replenishment, saline water intrusion barriers, distribution system losses, and other water demand sources. ¹⁹ Table 3.15-4 provides the projected potable and recycled water demand for 2020, 2025, 2030, 2035, 2040, and 2045.

¹⁵ City of Pleasanton. 2021. 2020 Urban Water Management Plan (2020 UWMP). June.

¹⁶ Ibid.

¹⁷ Watearth. 2022. City of Pleasanton Water Supply Assessment (WSA) for 2023-2031 Housing Element Update. October.

¹⁸ City of Pleasanton. 2021. 2020 Urban Water Management Plan (2020 UWMP). June.

¹⁹ Watearth. 2022. City of Pleasanton Water Supply Assessment (WSA) for 2023-2031 Housing Element Update. October.

Table 3.15-4: Pleasanton Projected Water Demand Summarized by Potable and Recyclable Water (2020-2045)

Projected Water Demand (AFY)						
Water Supply	2020	2025	2030	2035	2040	2045
Potable Water	14,779	16,740	17,239	17,737	18,236	18,236
Recycled Water	1,228	1,500	1,650	1,650	1,800	1,800
Total	16,007	18,240	18,889	19,387	20,036	20,036

Notes:
AFY = acre-feet per year
Source: Watearth. 2022. City of Pleasanton Water Supply Assessment (WSA) for 2023-2031 Housing Element Update. October.

Water Infrastructure and Distribution

California pumps State Water Project water from the Sacramento-San Joaquin Delta via the California Aqueduct and conveys it to the Valley via the South Bay Aqueduct. Zone 7 treats this imported water at its Patterson Pass and Del Valle Water Treatment Plants in Livermore, and then sends it to Pleasanton via the Zone 7 Cross Valley and Vineyard Pipelines. Zone 7 also stores water from the State Water Project and from local runoff in the Del Valle Reservoir and uses this water to replenish groundwater supplies through release into the Arroyo del Valle and Arroyo Mocho. Zone 7 also uses this water as a secondary local supply to its two water treatment plants.²⁰

Wastewater

Wastewater from the City of Pleasanton is discharged to and treated at two treatment plants: the RWTF (owned and operated by DSRSD) and the LWRP (owned and operated by the City of Livermore). The LWRP only treats wastewater from the City of Pleasanton’s Ruby Hills housing development. Unrecycled treated wastewater is sent through the Livermore-Amador Valley Water Management Agency (LAVWMA) pipeline for ultimate disposal by the East Bay Dischargers Authority (EBDA) in the San Francisco Bay.²¹

Wastewater Generation

The City of Pleasanton handles the collection of wastewater generated from three areas: City of Pleasanton’s service area, the Ruby Hills development (treated by the LWRP), and the Castlewood Area of Alameda County. The City operates a sanitary sewer system that serves a residential population of approximately 83,007 in a 24 square mile service area. The sewer system consists of about 250 miles of gravity sewers, approximately 25,192-feet of force main, and 10 pump stations. Average Daily Dry Weather flow is 7 MGD. The sewers range in size from 4-inch to 42-inch diameter.²²

²⁰ City of Pleasanton. 2009. Pleasanton General Plan 2005-2025, Section 14–Subregional Planning Element. July.

²¹ City of Pleasanton. 2021. 2020 Urban Water Management Plan (2020 UWMP). June.

²² City of Pleasanton. 2019. Sewer System Management Plan. December.

Wastewater Treatment

The RWTF handles wastewater from the city (aside from the wastewater from the Ruby Hills housing development, which is treated at the LWRP). The City currently owns 8.5 mgd of secondary treatment capacity from the RWTF. The RWTF includes secondary, tertiary, and advanced recycled water treatment facilities. The current average dry-weather wastewater-flow design capacity of the secondary treatment facilities is 17 mgd with an ultimate required capacity of 20.7 mgd at buildout of the 2020 UWMP in 2045. 10.4 mgd of this influent is projected to originate from the DSRSD service area and the remaining 10.3 mgd of influent is projected to originate from the city. Conventional secondary treatment methods include primary sedimentation, activated sludge secondary treatment, chlorine disinfection, and effluent pumping. A portion of the secondary effluent undergoes the tertiary treatments of sand filtration and ultraviolet (UV) disinfection, which has a treatment capacity of 16.2 mgd. Backup facilities exist to handle times of low or high demand, with a capacity of 3 mgd.

The LWRP handles wastewater from the Ruby Hills housing development. Through 2018 to 2020, the LWRP had an average dry-weather wastewater-flow design capacity of 5.4 mgd. Treated wastewater not recycled is disposed into the San Francisco Bay. Conventional secondary treatment included the use of the active sludge process and sodium hypochlorite disinfection. Tertiary treatments utilized mono-media filters and UV disinfection. The current LAVWMA pipeline discharge capacity is 41.2 mgd.

Stormwater

Generation and Infrastructure

The City of Pleasanton along with several other agencies in Alameda County are permittees of the Alameda Countywide Clean Water Program. The City also operates under the San Francisco Regional Water Quality Control Board's (RWQCB) National Pollutant Discharge Elimination System (NPDES) Municipal Regional Permit (MRP). This allows the City to discharge stormwater runoff from storm drains and watercourses within the area of the Alameda Countywide Clean Water Program. The City of Pleasanton owns and maintains drainage facilities within the city limits consisting of underground pipes, local channels, and natural swales in hillside areas. These facilities carry water runoff within the drainage basin to the flood control channels (known locally as arroyos) many of which are owned and operated by Zone 7. Development projects creating or replacing over 2,500 square feet of impervious services will require satisfaction of the City's Stormwater Requirements Checklist, which ensures the implementation of regulated stormwater infrastructure into new projects.²³

Stormwater Treatment

The City stormwater drainage facilities carry water runoff within a drainage basin to the flood control channels (arroyos). Developers of new projects are required to install adequately sized storm drains to connect to the City's existing storm drain network. Hillside projects must protect natural drainage

²³ City of Pleasanton. 2014. Stormwater Requirements Checklist. March.

courses and install silt basins or retention ponds to control pollutants and the runoff-flow rate. The City requires new developments to size their storm drains to accommodate major rainfalls.²⁴

Currently, the City does not implement any stormwater recovery systems. However, the 2020 UWMP describes possible implementation of stormwater recovery to reuse as a water supply source to meet local water supply demands in the UWMP. Beneficial reuses include blending with other water supplies for groundwater recharge, redirecting it into constructed wetlands or landscaping, and diverting it to a treatment facility for subsequent reuse.²⁵

Solid Waste

Solid Waste Collection

The City has a franchise agreement with Pleasanton Garbage Service (PGS) through 2029, renewed in 2018.²⁶ The agreement gives PGS rights to collect and transport solid waste in the city. PGS currently contracts with Browning Ferris Industries for disposal at the Vasco Road Landfill in Livermore. The Vasco Road Landfill has a total design capacity of 32,970,000 cubic yards. It is authorized to accumulate 2,518 tons of solid waste per day and have a total traffic of 625 vehicles per day, subject to review in 2027.²⁷ According to the Alameda County Countywide Integrated Waste Management Plan (CoIWMP), and assuming achievement of countywide waste reduction goals, the Vasco Road Landfill will have capacity through to 2035, with a current remaining capacity of 6 million cubic yards (approximately 5.5 million tons).²⁸

Solid Waste Generation

According to the CoIWMP, in 2016, the most recent data available, the city generated 96,744 tons of disposal solid waste, 10,360 tons of recycled solid waste, and 14,889 tons of compostable waste. In 2018, the city's per capita disposal rate was 7.2, recycling rate was 0.7, and green waste rate was 1.0 pounds per person per day. This equated to a recycling diversion rate of 64 percent.²⁹ It is projected that by 2025, the city will generate 283,300 tons of solid waste, but with a 50-75 percent recycling diversion rate, depending on the city's ability to reach its garbage diversion goals.³⁰ As of 2018, the most recent data available, the city's diversion rate was 77 percent, which is exceeding the Statewide diversion goal of 75 percent.³¹

Solid Waste Disposal

PGS currently exclusively oversees the city's solid waste collection and transportation from all residential, commercial, and industrial waste generators in the city, subject to limited exceptions. Disposal of waste occurs at the Vasco Road Landfill, which has a total design capacity of 32,970,000

²⁴ City of Pleasanton. 2009. Pleasanton General Plan 2005-2025. Section 8—Water Element. July.

²⁵ City of Pleasanton. 2021. 2020 Urban Water Management Plan (2020 UWMP). June.

²⁶ City of Pleasanton. 2018. Franchise Agreement with Pleasanton Garbage Service. July.

²⁷ California Department of Resources Recycling and Recovery (CalRecycle). 2007. Solid Waste Facility Permit. May.

²⁸ Alameda County Waste Management Authority (WMA). 2020 (last amended January 11, 2022). Alameda County Integrated Waste Management Plan (CoIWMP). April.

²⁹ Alameda County Waste Management Authority (WMA). 2020 (last amended January 11, 2022). Alameda County Integrated Waste Management Plan (CoIWMP). April.

³⁰ Alameda County Waste Management Authority (WMA). 2020. Alameda County Integrated Waste Management Plan (CoIWMP). April.

³¹ Alameda County Waste Management Authority (WMA). 2020. Alameda County Integrated Waste Management Plan (CoIWMP), Table 4-3: AB 939 Diversion Rates, 2018. April.

cubic yards. Vasco Road Landfill is authorized to accumulate 2,518 tons of solid waste per day and have a total traffic of 625 vehicles per day, subject to review in 2027. Recyclable solid wastes are processed at the Pleasanton Transfer Station by PGS. The Pleasanton Transfer Station holds a design capacity of 720 tons per day and incorporates a materials recovery facility and a buy-back center.³²

Electricity, Natural Gas, and Telecommunications

Electricity

The electrical power distribution network within the city is owned and operated by Pacific Gas and Electric Company (PG&E). The electrical power grid consists of both overhead and underground electrical lines.

The City adopted the East Bay Community Energy (EBCE) community choice aggregation program as the default energy provider in 2021. It has since upgraded the default electrical service to EBCE's Renewable 100 service, ensuring a 100 percent carbon-free electrical supply to all Pleasanton customers. Any customers on PG&E services have been placed on Time-of-Use rate plans, as part of the California Public Utilities Commission's (CPUC) Statewide initiative to ensure greater power reliability and better energy future.³³

Natural Gas

The natural gas distribution system within the city is also owned and operated by PG&E, whose service area stretches from Eureka in the north to Bakersfield in the south, and from the Pacific Ocean in the west to the Sierra Nevada in the east. PG&E provides 42,141 miles of natural gas distribution pipelines and 6,438 miles of transmission pipelines.

As part of the City's Climate Action Plan 2.0 (CAP 2.0), all new and existing development should be shifting from natural gas supply to an all-electrical energy grid. The existing Building Electrification Plan and All-Electric Reach Code for new construction provide an implementation plan for ensuring a natural gas phase-out.

Telecommunications

Residents and businesses in the city have a growing range of telecommunications services and options to choose from. Landline service is provided by a variety of local providers, including Ooma, Community Phone Landline, and Xfinity Landline. Additionally, there are numerous internet providers in the city, including AT&T, Xfinity, T-Mobile, Viasat, HughesNet, and Ethernic.

3.15.3 - Regulatory Framework

Federal

Safe Drinking Water Act

The Safe Drinking Water Act authorizes the United States Environmental Protection Agency (EPA) to set national standards for drinking water, called the National Primary Drinking Water Regulations, to

³² City of Pleasanton. 2009. Pleasanton General Plan 2005-2025. Section 6—Public Facilities and Community Programs Element. July.

³³ City of Pleasanton. 2022. East Bay Community Energy (EBCE). Website: https://www.cityofpleasantonca.gov/gov/hottopics/east_bay_community_energy.asp. Accessed July 20, 2022.

protect against both naturally occurring and man-made contaminants. These standards set enforceable maximum contaminant levels in drinking water and require all water providers in the United States to treat water to remove contaminants, except for private wells serving fewer than 25 people. In California, the State Department of Health Services conducts most enforcement activities. If a water system does not meet standards, it is the water supplier's responsibility to notify its customers.

Clean Water Act (National Pollutant Discharge Elimination System)

The Water Pollution Control Act of 1972, more commonly known as the Clean Water Act (CWA), regulates the discharge of pollutants into watersheds throughout the nation. Under the CWA, the EPA implements pollution control programs and sets wastewater standards.

The NPDES permit program was established within the CWA to regulate municipal and industrial discharges to surface waters of the United States. Federal NPDES permit regulations have been established for broad categories of discharges, including point-source municipal waste discharges and nonpoint-source stormwater runoff. NPDES permits generally identify effluent and receiving water limits on allowable concentrations and/or mass emissions of pollutants contained in the discharge; prohibitions on discharges not specifically allowed under the permit; and provisions that describe required actions by the discharger, including industrial pretreatment, pollution prevention, self-monitoring, and other activities. Wastewater discharge is regulated under the NPDES permit program for direct discharges into receiving waters and by the National Pretreatment Program for indirect discharges to a sewage treatment plant. In 2003, smaller (less than 100,000 population) municipalities and unincorporated counties were required to obtain coverage under a Statewide NPDES Municipal General Stormwater Permit (Phase II Permit) issued by the State Water Board. In Alameda County, the County and all municipalities, including the City of Pleasanton, are subject to the conditions of the regulations described in the current MRP, Order No. R2-2022-0018, adopted on May 11, 2022.

Title 40 of the Code of Federal Regulations

Title 40 of the Code of Federal Regulations, Part 258 (Resource Conservation and Recovery Act [RCRA], Subtitle D), contains regulations for municipal solid waste landfills and requires states to implement their own permitting programs incorporating the federal landfill criteria.

State

California Water Code

The California Water Code, a section of the California Code of Regulations, is the governing law for all aspects of water management in California.

California Porter-Cologne Water Quality Control Act

The Porter-Cologne Water Quality Control Act of 1969 (Porter-Cologne Act) is California's statutory authority for the protection of water quality. Under the Porter-Cologne Act, the State must adopt water quality policies, plans, and objectives that protect the State's waters for the use and enjoyment of the people. Regional authority for planning, permitting, and enforcement is delegated to the nine RWQCBs. The Porter-Cologne Act sets forth the obligations of the State Water Board and

the nine RWQCBs, which engage in several water quality functions in their respective regions and regulate all pollutant or nuisance discharges that may affect either surface water or groundwater. The San Francisco Bay RWQCB is responsible for the City of Pleasanton.

California Urban Water Management Planning Act

The Urban Water Management Planning Act (California Water Code §§ 10610–10656) requires that all urban water suppliers with at least 3,000 customers prepare UWMPs and update them every 5 years. The Act requires that UWMPs include a description of water management tools and options used by that entity that will maximize resources and minimize the need to import water from other regions. Specifically, UWMPs must:

- Provide current and projected population, climate, and other demographic factors affecting the supplier's water management planning;
- Identify and quantify, to the extent practicable, the existing and planned sources of water available to the supplier;
- Describe the reliability of the water supply and vulnerability to seasonal or climatic shortage;
- Describe plans to supplement or replace that source with alternative sources or water demand management measures;
- Describe the opportunities for exchanges or transfers of water on a short-term or long-term basis (associated with systems that use surface water);
- Quantify past and current water use;
- Provide a description of the supplier's water demand management measures, including schedule of implementation, program to measure effectiveness of measures, and anticipated water demand reductions associated with the measures; and
- Assess the water supply reliability.

California Health and Safety Code

Section 64562 of the California Health and Safety Code establishes water supply requirements for service connections to public water systems. Before additional service connections can be permitted, enough water must be available to the public water system from its water sources and distribution reservoirs to adequately, dependably, and safely meet the total requirements of all water users under maximum-demand conditions.

California Senate Bill 610 and 221, Water Supply Assessment and Verification

SB 610 and SB 221 amended State law to ensure better coordination between local water supply and land use decisions and confirm that there is an adequate water supply for new development. Both statutes require that detailed information regarding water availability be provided to city or county decision-makers prior to approval of large development projects. SB 610 requires the preparation of a WSA for certain types of projects, as defined by Water Code Section 10912, which are subject to California Environmental Quality Act (CEQA) Guidelines. Projects required to prepare a WSA are defined as follows:

- Residential development of more than 500 dwelling units.
- Shopping center or business establishment employing more than 1,000 persons or having more than 500,000 square feet of floor area.
- Hotel or motel, or both, having more than 500 rooms.
- Industrial, manufacturing or processing plant, or industrial park planned to employ more than 1,000 persons, occupying more than 40 acres of land, or having more than 650,000 square feet of floor area.
- Mixed-use projects that include one or more of the projects specified above.
- Project that would demand an amount of water equivalent to, or greater than, the amount of water required for 500 dwelling units.

SB 221 establishes consultation and analysis requirements related to water supply planning for residential subdivisions including more than 500 dwelling units. The water supplier must provide written verification that sufficient water is available for a project before construction begins. The document used to determine compliance with both SB 610 and SB 221 is the adopted UWMP.

California Water Code Section 10910 states that any city or county is responsible for determining whether a project, as defined by Water Code Section 10912, is subject to CEQA. Water Code Section 10912 defines a project in several ways, including "a proposed residential development of more than 500 dwelling units." The Housing Element Update could facilitate the development of more than 500 dwelling units; however, the Housing Element Update is a planning document, not a specific development project, and it therefore does not directly trigger the need for a WSA as defined by California Water Code. Nonetheless, a WSA was prepared for the Housing Element Update to provide an analysis of potential impacts to water supply availability and reliability.

SB 221 requires that a development agreement for a subdivision of property of more than 500 residential units cannot be approved unless sufficient and reliable water supply is available to satisfy the project's needs. SB 221 requires the provision of written verification from the water service provider indicating that sufficient water supply is available to serve a proposed subdivision or a finding by the local agency that sufficient water supplies are or will be available prior to completion of a project. SB 221 specifically applies to residential subdivisions of 500 units or more. Government Code Section 66473.7(i) exempts "any residential project proposed for a site that is within an urbanized area and has been previously developed for urban uses, or where the immediate contiguous properties surrounding the residential project site are, or previously have been, developed for urban uses, or housing projects that are exclusively for very low and low income households."

The Housing Element Update is a planning level document that does not involve any specific development application. As such, it does not propose development of 500 or more dwelling units in a nonurban area and is not subject to SB 221. Individual development projects consistent with the Housing Element Update would be required to comply with SB 221.

Assembly Bill 715

Assembly Bill (AB) 715, enacted in 2007, requires that any toilet or urinal sold or installed in California on or after January 1, 2014, cannot have a flush rating exceeding 1.28 and 0.5 gallons per flush, respectively. AB 715 superseded the State's previous standards for toilet and urinal water use set in 1991 of 1.6 and 1.0 gallons per flush, respectively. On April 8, 2015, in response to the Governor's Emergency Drought Response Executive Order (EO B-29-15), the California Energy Commission approved new standards for urinals requiring that they not consume more than 0.125 gallons per flush, 75 percent less than the standard set by AB 715.

Water Conservation Act of 2009

The Water Conservation Act of 2009 (SB X7-7) requires all water suppliers to increase water use efficiency. The legislation set an overall goal of reducing per capita water by 20 percent by 2020 in each water district. Effective in 2016, urban retail water suppliers who do not meet the water conservation requirements established by this bill are not eligible for State water grants or loans.

California Model Water Efficient Landscape Ordinance

The Model Water Efficient Landscape Ordinance (MWELO) was adopted by the Office of Administrative Law in September 2009 and requires local agencies to implement water-efficiency measures as part of their review of landscaping plans. Local agencies can either adopt the MWELO or incorporate provisions of the ordinance into code requirements for landscaping. Former Governor Brown's Drought Executive Order of April 1, 2015 (EO B-29-15) directed DWR to update the State's MWELO (Ordinance) through expedited regulation. The California Water Commission approved the revised Ordinance on July 15, 2015.

New development projects that include landscape areas of 500 square feet or more are subject to the Ordinance. This applies to residential, commercial, industrial, and institutional projects that require a permit, plan check, or design review. The previous landscape size threshold for new development projects ranged from 2,500 square feet to 5,000 square feet. The size threshold for existing landscapes that are being rehabilitated has not changed, remaining at 2,500 square feet. Only rehabilitated landscapes that are associated with a building or landscape permit, plan check, or design review are subject to the Ordinance. The Municipal Code Section 17.14.002 states that development shall comply with the State of California MWELO.

Groundwater Management Act

The 1992 Groundwater Management Act, AB 3030, established provisions by which local water agencies could develop and implement Groundwater Management Plans (GMP). GMPs are generally designed to prevent local and regional aquifer overdrafting, which reduces available groundwater resources and which, under certain conditions, can lead to degradation of water quality and to land subsidence. The City has been, and continues to be, involved in both regional and local groundwater management efforts.

Sustainable Groundwater Management Act

On August 29, 2014, the California Legislature passed comprehensive groundwater legislation contained in SBs 1168 and 1319 as well as AB 1739, which are collectively referred to as the

Sustainable Groundwater Management Act (SGMA). This legislation was signed by former Governor Brown on September 16, 2014, and became effective on January 1, 2015. The legislative intent of SGMA is to provide sustainable management of groundwater basins, enhance local management of groundwater, establish minimum standards for sustainable groundwater management, and provide local groundwater agencies with the authority and the technical and financial assistance necessary to sustainably manage groundwater.

Senate Bill 407

SB 407, enacted in 2009, mandates that all existing buildings in California come up to current State plumbing fixture standards within this decade. This law establishes requirements that residential and commercial property built and available for use on or before January 1, 1994, replace plumbing fixtures that are not water conserving, defined as “noncompliant plumbing fixtures.” This law also requires a seller or transferor of single-family residential property show to the purchaser or transferee, in writing, the specified requirements for replacing plumbing fixtures and whether the real property includes noncompliant plumbing. Similar disclosure requirements went into effect for multi-family and commercial transactions on January 1, 2019. SB 837, passed in 2011, reinforces the disclosure requirement by amending the statutorily required transfer disclosure statement to include disclosure about whether the property follows SB 407 requirements.

Title 22 of California Code of Regulations

Title 22 regulates the use of reclaimed wastewater (recycled water). In most cases, only disinfected tertiary water may be used on food crops where recycled water would encounter the edible portion of a crop. Disinfected secondary treatment may be used for food crops where the edible portion is produced below ground and will not encounter secondary effluent. Lesser levels of treatment are required for other types of crops, such as orchards, vineyards, and fiber crops.

General Waste Discharge Requirement

On May 2, 2006, the State Water Board adopted a General Waste Discharge Requirement (Order No. 2006-0003) for all publicly owned sanitary sewer collection systems in California with more than one mile of sewer pipe. The order provides a consistent Statewide approach to reducing sanitary sewer overflows by requiring public sewer system operators to take all feasible steps to control the volume of waste discharged into the system, to prevent sanitary sewer waste from entering the storm sewer system, and to develop a Sewer System Management Plan (SSMP). The General Waste Discharge Requirement also requires that storm sewer overflows be reported to the State Water Board using an online reporting system. The State Water Board delegated authority to its nine RWQCBs to enforce these requirements.

Assembly Bill 341

The purpose of AB 341 is to reduce greenhouse gas (GHG) emissions by diverting commercial solid waste to recycling efforts and to expand the opportunity for additional recycling services and recycling manufacturing facilities in California. In addition to Mandatory Commercial Recycling, AB 341 sets a Statewide goal for 75 percent disposal reduction by the year 2020.

California Integrated Waste Management Act, Assembly Bill 939

AB 939 (Public Resources Code [PRC] § 41780) requires cities and counties to prepare Integrated Waste Management Plans and to divert 50 percent of solid waste from landfills beginning in calendar year 2000 and each year thereafter. AB 939 also requires cities and counties to prepare Source Reduction and Recycling Elements as part of the Integrated Waste Management Plan (IWMP). These elements are designed to develop recycling services to achieve diversion goals, stimulate local recycling in manufacturing, and stimulate the purchase of recycled products.

Senate Bill 1016

SB 1016 builds on AB 939 compliance requirements by requiring that the 50 percent solid waste diversion be measured in terms of per capita disposal expressed as pounds per person per day. The new per capita disposal and goal measurement system moves the emphasis from an estimated diversion measurement number to using an actual disposal measurement number as a factor. Every year CalRecycle calculates each jurisdiction's per capita (per resident and per employee) disposal rates and reviews jurisdiction compliance on a case-by-case basis. Jurisdictions are not compared to other jurisdictions or the Statewide average but compared to their own 50 percent per capita disposal target.

Senate Bill 1383

As described in Section 3.7, Greenhouse Gas Emissions, SB 1383 was signed in September 2016 to reduce emissions of short-lived climate pollutants. As it pertains to CalRecycle, SB 1383 establishes targets to achieve a 50 percent reduction in the level of the Statewide disposal of organic waste from the 2014 level by 2020 and a 75 percent reduction by 2025. The law grants CalRecycle the regulatory authority required to achieve the organic waste disposal reduction targets and establishes an additional target that not less than 20 percent of currently disposed edible food³⁴ is recovered for human consumption by 2025.³⁵ SB 1383 further supports California's efforts to achieve the Statewide 75 percent recycling goal by 2020 established in AB 341.

California Public Utilities Commission

The CPUC regulates privately owned telecommunication, electric, natural gas, water, railroad, rail transit, and passenger transportation companies. It is the responsibility of the CPUC to (1) assure California utility customer safety, reliable utility service at reasonable rates; (2) protect utility customers from fraud; and (3) promote a healthy California economy. The Public Utilities Code, adopted by the legislature, defines the jurisdiction of the CPUC.

California Code of Regulations Title 24

Part 6 (Energy Efficiency Standards for Residential and Nonresidential Buildings)

California Code of Regulations Title 24 Part 6 (California's Energy Efficiency Standards for Residential and Nonresidential Buildings) was first adopted in 1978 in response to a legislative mandate to reduce California's energy consumption. The standards are updated periodically to allow

³⁴ According to CalRecycle's Food Recovery Questions and Answers regarding SB 1383, the regulations require commercial edible food generators, such as a grocery store, to donate the maximum amount of their edible food that would otherwise be disposed of.

³⁵ California Department of Resources Recycling and Recovery (CalRecycle). 2022. Short-Lived Climate Pollutants: Organic Waste Methane Emissions Reductions. Website: <https://www.calrecycle.ca.gov/Climate/SLCP/>. Accessed May 2, 2022.

consideration and possible incorporation of new energy-efficient technologies and methods. Energy-efficient buildings require less electricity; therefore, increased energy efficiency reduces fossil fuel consumption and decreases GHG emissions. The 2019 Building Energy Efficiency Standards went into effect on January 1, 2020.³⁶ The 2022 Building Energy Efficiency Standards are scheduled to go into effect on January 1, 2023.³⁷

Part 11 (California Green Building Standards Code)

California Code of Regulations Title 24, Part 11, is a comprehensive and uniform regulatory code for all residential, commercial, and school buildings that went into effect January 1, 2011. The code is updated on a regular basis, with the most recent update consisting of the 2019 California Green Building Standards Code (CALGreen) that became effective January 1, 2020.³⁸ Local jurisdictions are permitted to adopt more stringent requirements, as State law provides methods for local enhancements. The code recognizes that many jurisdictions have existing construction and demolition ordinances and defers to them as the ruling guidance if they provide a minimum 50 percent waste diversion requirement. The code also provides exemptions for areas not served by construction and demolition recycling infrastructure. The California Building Standards Code (CBC) provides the minimum standard that buildings must meet to be certified for occupancy, which is enforced by the local building or planning departments with jurisdiction over the building.

Regional

Alameda County Clean Water Program

Working with agencies from around Alameda County, the Alameda County Clean Water program facilitates local compliance with the Federal CWA. The Alameda County Clean Water Program fosters a culture of stewardship of local creeks, wetlands and the Bay. Alameda County homes and businesses are connected to these important waters through the network of storm drains found in most neighborhoods.

Alameda County Countywide Integrated Waste Management Plan

The Alameda County CoIWMP serves as a roadmap to approaching Alameda County's solid waste management and recycling issues. The document contains two elements of the CoIWMP and describes both the current and desired state of waste and materials management in Alameda County. Similar to a city's General Plan, it is intended to be far-reaching with long-term relevance. In addition to addressing core infrastructure needs: collection, transport, processing facilities, and landfills, this document provides the context and rationale for a comprehensive approach to the current and future waste management issues facing Alameda County. In response to these issues, as well as fulfilling the requirement to provide a minimum 15 years of landfill capacity, the Alameda

³⁶ California Energy Commission (CEC). 2022. 2019 Building Energy Efficiency Standards. Website: <https://www.energy.ca.gov/programs-and-topics/programs/building-energy-efficiency-standards/2019-building-energy-efficiency>. Accessed July 19, 2022.

³⁷ California Energy Commission (CEC). 2022. 2022 Building Energy Efficiency Standards. Website: <https://www.energy.ca.gov/programs-and-topics/programs/building-energy-efficiency-standards/2022-building-energy-efficiency>. Accessed July 19, 2022.

³⁸ International Code Council, Inc. 2022. 2019 California Green Building Standards Code. Website: <https://codes.iccsafe.org/content/CGBC2019P4>. Accessed July 19, 2022.

County Waste Management Authority (WMA) has adopted the goals, objectives, and policies included in the CoIWMP to guide decision-making and programs.

Alameda County Organics Reduction and Recycling Ordinance

The Alameda County Organics Reduction and Recycling Ordinance adopted by the WMA serves as a single and comprehensive framework to achieve the reduction of organic and recyclable materials deposited in landfills necessary to carry out the purposes of the Joint Exercise of Powers Agreement for Waste Management and implement the CoIWMP and to comply with SB 1383. Goals include the maintenance of landfill disposal capacity while minimizing impacts, reducing consumption, and addressing environmental impacts of infrastructure, informing the public on waste reduction activities, among other goals.

Alameda County Flood Control and Water Conservation District

The Alameda County Flood Control and Water Conservation District provides flood protection for Western Alameda County residents and businesses. The District plans, designs, constructs, and maintains flood control systems such as natural creeks, channels, levees, pump stations, dams, and reservoirs. It also cares for the natural environment through public outreach and enforcement of pollution control regulations governing its waterways.

Plan Bay Area 2050

Plan Bay Area 2050 is a long-range plan charting the course for the future of the nine-county San Francisco Bay Area. Plan Bay Area 2050 focuses on four key elements: housing, the economy, transportation and the environment, and identifies a path to make the Bay Area more equitable for all residents and more resilient in the face of unexpected challenges. The environment chapter (Chapter 5) specifically references long-term regional strategies and goals surrounding water and energy, among other topics.

Local

City of Pleasanton

City of Pleasanton General Plan

The General Plan, adopted in 2009 and last amended in August 2019, contains the following relevant policies and programs that assist in reducing or avoiding impacts related to utilities and service systems:

Public Facilities and Community Programs Element

The Public Facilities and Community Programs Element, Chapter 6 of the General Plan, consolidates information and policies related to the capital improvements, public facilities, and programs needed to service the community at buildout including schools, libraries, high-speed wireless internet access (Wi-Fi), recreation and parks, other community facilities, and solid waste.

Goal 1 Provide sufficient public facilities and community programs to efficiently serve existing and future development while preserving and enhancing the quality of life for existing and future residents.

Capital Improvements and Financing

- Goal 3** Promote responsible financing and construction to preserve and enhance Pleasanton’s public facilities.
- Policy 2** Development should pay its fair share for the construction and use of municipal facilities.
- Program 2.1** Require future development to pay its fair share of the cost of purchasing sites and financing needed improvements for existing and future municipal facilities, such as a city hall, fire stations, athletic facilities, libraries, cultural arts center, etc.
- Policy 3** Require annexation to the City as a pre-requisite to utility extension.
- Program 3.1** Encourage annexation of those parcels within the Pleasanton Sphere of Influence which are able and willing to pay for City services and utility extensions, where financially feasible for the City.
- Policy 5** To maintain City service standards, construct permanent City sewer, water, and storm drainage improvement as a condition of new development.
- Program 5.1** Coordinate developer financing with the City’s Capital Improvement Program to ensure adequate capacity for future growth.
- Program 5.2** Evaluate infrastructure capacity and needed improvements as part of the City’s Growth Management Report.

Solid Waste

- Goal 10** Strive to meet or exceed State and County standards for source reduction and waste diversion, including the countywide goal of 75 percent reduction of waste going to landfills by 2010.
- Policy 25** As a City organization, develop programs which model best practices in source reduction, waste diversion and use of recycled products.
- Program 25.2** Adopt purchasing policies that give preference to recycled content and environmentally friendly products in City procurement, where economically feasible.
- Policy 26** Minimize the City’s generation of solid waste materials by supporting the Alameda County Integrated Waste Management Plan and Source Reduction and Recycling Plan and by developing City recycling programs using the California Diversion rate methodology for measurement.
- Program 26.4** Promote incentives for using recycled materials in construction or manufacturing.
- Program 26.5** Adopt a construction and demolition debris recycling ordinance.

- Program 26.6** Promote and provide incentives for using recycled materials in the home or business.
- Program 26.7** Consider requiring businesses and multi-family residents to participate in recycling and waste reduction programs.
- Program 26.8** Promote and provide incentives for the reduction of curbside waste.
- Program 26.12** Develop a household hazardous waste information program to better inform the public of existing and future services, and the products considered household hazardous waste.
- Program 26.18** Residential projects with more than three units and all nonresidential projects in the City shall prepare and implement a Project Waste Diversion Plan that includes a discussion of the project's diversion strategies. The plan shall include a description of on-site disposal, composting and recycling facilities, a construction debris disposal and recycling plan, and a discussion of any pre-waste stream conservation measures appropriate to the project. The City shall review and approve waste diversion plans as part of the land entitlement process for projects.

Water Element

The Water Element, Chapter 8 of the General Plan, consolidates information and policies related to the conservation and management of water resources, riparian corridors, and watershed lands. The Water Element also defines the water, wastewater, and stormwater facilities needed to serve the community.

- Goal 1** Preserve and protect water resources and supply for long-term sustainability.
- Policy 1** To ensure sustainability, promote the conservation of water resources.
- Program 1.1** Prohibit water supply production policies and practices which would deplete groundwater resources below existing sustainable levels.
- Program 1.2** Foster waste conservation practices which do not allow depletion of groundwater and surface water resources to the extent that they cannot be replaced within the same water season.
- Program 1.5** Utilize cost-effective water reclamation and recycling techniques for the purpose of water conservation rather than as a new source of water which must be used to sustain new and existing development, where these techniques can be implemented without degrading surface water and groundwater quality.
- Program 1.7** Require the installation of water conservation devices in new construction and additions.

- Program 1.8** Encourage Zone 7 to continue its ongoing citywide rebate program for water-conserving fixtures and appliances.
- Program 1.10** During construction or reconstruction of public facilities, institute water conservation measures such as hot-on-demand water faucets, low-flush toilets, low water-using appliance, and low water-using irrigation devices and/or water-conserving landscaping.
- Program 1.11** Retrofit existing public facilities, as feasible, to institute water conservation measures.
- Program 1.12** Compile a list of recommended landscaping species, including trees, that are native and drought tolerant. Include discussion of any wildlife habitat values of these species. Compile a list of noxious and invasive species and educate the public about their disadvantages. Distribute these lists to the public and make them available at the Planning and Building offices, as well as at the Library.
- Program 1.13** Plant drought-tolerant landscaping in appropriate locations. All landscaping aspects from plant selection to irrigation methods should be designed to reduce water demand, decrease runoff, and minimize impervious surfaces.
- Program 1.14** Undertake programs to educate citizens about water conservation in the home and in landscaping.

Water Quality

- Goal 3** Ensure a high level of water quality and quantity at a reasonable cost and improve water quality through production and conservation practices which do not negatively impact the environment.
- Policy 3** Protect the quality and quantity of surface water and groundwater resources in the Planning Area.
- Program 3.1** Do not utilize water reclamation techniques, including reverse osmosis, which could adversely affect or have potentially negative impacts on drinking water quality, surface waters, or groundwater resources.
- Program 3.4** To preserve areas with prime percolation capabilities, regulate projects that use toxic chemicals including herbicides in water recharge areas, such as adjacent to arroyos.
- Program 3.5** Coordinate with Zone 7 to control pollutant discharges and increase public education regarding the use of pesticides, such as diazinon, and the use of herbicides.
- Program 3.6** Prohibit new septic systems, automobile dismantlers, waste disposal facilities, industries utilizing toxic chemicals, and other potentially polluting uses in areas

where pollution could impact flood waters, groundwater, streams, creeks, or reservoirs.

Program 3.8 Coordinate with the Dublin San Ramon Services District to investigate cost-effective sewage treatment and disposal methods that utilize reclaimed wastewater for productive use and that protect that quality of the groundwater supply.

Program 3.9 Support the policies and programs contained in the Water Quality Control Plan for the San Francisco Bay Basin to the extent they are consistent with the City's policies for water quality.

Program 3.12 Conserve Pleasanton's urban forest, including trees in parks and on private property as well as street trees, so as to continue and enhance surface water filtration and community character. Pervious ground surfaces and the trees' root systems help in the filtration of surface water below the ground level.

Water Systems

Goal 4 Provide sufficient water supply and promote water safety and security.

Policy 4 Ensure an adequate water system and a high-quality water supply for existing and future development and maintain an adequate reserve of water in storage facilities.

Program 4.1 Require new development to pay for its fair share of the City's water system master plan improvements.

Program 4.4 Maintain sufficient water pressure to serve residential, commercial, industrial, and fire-flow requirements as determined by the City Engineer.

Program 4.5 Utilize water reclamation methods to the fullest extent feasible, where safe and nonpolluting

Program 4.9 In anticipation of planned future growth in Pleasanton, continue working with Zone 7 to plan and provide for sufficient future water supplies.

Wastewater

Goal 5 Provide adequate sewage treatment and minimize wastewater export.

Policy 5 Secure sewage capacity through all available means for residential, commercial, and industrial development

Program 5.1 Require new development to pay its fair share of the City's planned sewer system improvements including treatment, distribution, reuse, and export facilities.

Stormwater Facilities

Goal 6 Minimize stormwater runoff and provide adequate stormwater facilities to protect property from flooding.

- Policy 8** Ensure an adequate storm drainage system to serve existing and future development.
- Program 8.1** Require new development to pay its fair share of the storm drainage system improvement costs.
- Program 8.4** As determined by the City Engineer, require new development to improve local storm drainage systems to accept appropriate design-year flows resulting from new development.
- Policy 9** Ensure a sufficient flood control system to serve existing and future development.
- Program 9.1** Require new development to pay its fair share of the flood control improvement costs included in Zone 7's Master Plan.
- Goal 7** Reduce stormwater runoff and maximize infiltration of naturally occurring rainwater so as to improve surface and subsurface water quality.
- Policy 10** Encourage a built environment that minimizes impervious surfaces.
- Program 10.1** Review development plans to minimize impervious surfaces and generally maximize infiltration of rainwater in soils, where appropriate. Maximize permeable areas to allow more percolation of runoff into the ground through such means as biofilters, green strips, planter strips, decomposed granite, porous pavers, swales, and other water-permeable surfaces. Require planter strips between the street and the sidewalk within the community, wherever practical and feasible.
- Program 10.2** Maximize the runoff directed to permeable areas or to stormwater storage by (1) orienting roof runoff toward permeable surfaces or drains, (2) grading the site to divert flow to permeable areas, (3) using cisterns, retention structures, or green rooftops to store precipitation for reuse, and (4) designing curbs and berms so as to avoid isolating permeable or landscaped areas.
- Program 10.3** Encourage design and construction of new streets to be the minimum width possible while still meeting all circulation, flow, and safety requirements. Encourage parking pullouts adjacent to landscaping and pervious surfaces, where practical and feasible.
- Policy 11** Implement stormwater runoff requirements, as required by the California State Water Quality Control Board and the Alameda Countywide Clean Water Program, with as little impact on development and business costs as possible.
- Program 11.1** Incorporate conditions of approval developed by the Alameda Countywide Clean Water Program, as appropriate, for new development and discretionary permits.
- Program 11.2** Develop design guidelines and standard details to enable developers to incorporate clean water runoff requirements into their projects.

- Program 11.3** Using the California Environmental Quality Act (CEQA) process, evaluate the development effects on stormwater runoff.
- Program 11.4** Encourage site planning and design techniques to minimize water quality impacts, including minimizing land disturbance, minimizing impervious surfaces, clustering development, preserving open space, and maintaining riparian areas with buffer zones to reduce runoff into waterways.
- Program 11.5** Include stormwater quality requirements in plans and contract specifications for City projects.
- Program 11.6** Require use of Best Management Practices for construction activities and ongoing business operations to prevent contaminants from entering the storm drain system.
- Program 11.7** Review the City's erosion and sedimentation prevention program to ensure that erosion prevention controls and enforcement are being implemented. Create an ordinance, if necessary, to accomplish these requirements.
- Program 11.8** To effectively prohibit non-stormwater discharges, conduct construction site field inspections to ensure proper erosion prevention and materials/waste management implementation.
- Program 11.9** Provide educational materials for distribution to developers, businesses, and the general public explaining stormwater quality issues and requirements, and Best Management Practices to help improve stormwater quality.
- Program 11.11** Minimize sedimentation and erosion by establishing standards for evaluating and implementing grading, quarrying, tree cutting, vegetation removal, road and bridge placement, off-road vehicle use, and domesticated animal-related soil disturbance controls.
- Program 11.12** Maintain and monitor storm drainage water quality improvement facilities

Housing Element

The Housing Element is the primary tool used by the State to ensure local governments are appropriately planning for and accommodating enough housing across all income levels for the planning period 2023-2031. Goals, policies, and programs regarding utilities and service systems in the Housing Element are provided in Chapter 2, Project Description, specifically, Goals 4 and 6. Policies 4.2, 6.1, 6.3, and 6.4, and Programs 4.4, 6.2, 6.3, and 6.5 provide guidance for utilities and service systems.

Vineyard Avenue Corridor Specific Plan

The Vineyard Avenue Corridor Specific Plan includes the 384-acre area along Vineyard Avenue in southeast Pleasanton. The Vineyard Avenue Corridor Specific Plan establishes a unique environment which includes a variety of agricultural, residential, open space, recreational, educational, and other

uses. Objectives, policies, and guidelines regarding utilities and service systems in the Vineyard Avenue Corridor Specific Plan include:

Public Facilities Objectives

1. To facilitate the provision of water, sanitary sewer, stormwater drainage, and other utility systems within a well-integrated overall network.
2. To facilitate flexibility in the timing and planning of infrastructure improvements.
3. To provide the opportunity for improved water and sanitary sewer service for existing residents within the Plan Area.

In support of these objectives, the Vineyard Avenue Corridor Specific Plan provides specific specifications for water, including pressure, distribution, storage, and water conservation; sanitary sewer; stormwater drainage; gas and electric; telephone and cable television; and emergency and personal wireless communications facilities.

Hacienda PUD Development Plan Design Guidelines

The Hacienda Planned Unit Development (PUD) area is generally located south of Interstate 580 (I-580), west of Tassajara Creek, north of West Las Positas Boulevard, and east of Hopyard Road. The Hacienda PUD Development Plan Design Guidelines (Hacienda Design Guidelines) ensure that development within the Hacienda PUD area is within the best interests of the public's health, safety, and general welfare, is consistent with the General Plan, compatible with existing developed properties, presents a positive image for the city along the I-580 frontage, and development within the Hacienda PUD area conform to the purpose of the PUD. Parcel 5D corresponds to Site 5 (Laborer Council), Parcel 9 corresponds to Site 7 (Hacienda Terrace), Parcel 18B to Site 8 (Muslim Community Center), Parcel 58C to Site 9 (Metro 580), and Parcel 56C corresponds to Site 29 (Oracle). Section 2.8(B) includes requirements for storm drainage collection and requires that all development within the Hacienda PUD area provide on-site storm drainage collection compliant with Low Impact Development standards.

City of Pleasanton Climate Action Plan 2.0

The City's CAP 2.0 was built upon the success of the previous plan. It develops a new suite of actions to reduce greenhouse gas emissions, mitigate the acceleration of climate change, and improve community resilience. The CAP 2.0 targets three sectors relevant to utilities: Buildings and Energy, Materials and Consumption, and Water Resources. The CAP 2.0 delineates several goals and frameworks to achieve said goals within these sectors, including maintaining zero-emissions energy through EBCE, SB 1383 implementation, textile recovery, the Water Conservation Program, on-site stormwater management, and more. The CAP 2.0 was adopted in March 2022. Relevant strategies are provided below:

Buildings and Energy: Reduce GHG emissions from buildings and associated energy consumption and increase buildings and energy resilience which will result in cost savings, improved public health, and improved infrastructure.

Strategy BE-1. Improve energy consumption and efficiency: Pleasanton is now participating in EBCE's Renewable 100 program, ensuring a high degree of Pleasanton is powered by 100 percent renewable energy and that low-income residents have access to discounted programs to keep energy affordable. Shifting from natural gas to electric (e.g., heat sources in homes) in all new and existing buildings will address the biggest remaining source of building emissions—natural gas—and build a foundation for fully transitioning to carbon-free renewable energy. Making the transition to all-electric will support green job creation and improved indoor air quality, as natural gas equipment is replaced and new buildings are built electric. Paired with increased energy efficiency and small-scale renewable energy and storage, buildings will also become more resilient to fluctuations in energy supply.

Strategy BE-2. Improve energy consumption and efficiency: As the City electrifies buildings to ensure that they are powered with clean, renewable energy, Pleasanton can further reduce energy emissions right away by making homes and buildings more energy efficient. This strategy builds on the City's progress to date in financing, outreach, and partnerships in support of energy efficiency and conservation. Energy efficiency also has the added benefit of reducing energy bills for residents and businesses. These cost savings are particularly important for lower income residents and renters, who tend to face a disproportionately higher energy burden because they are more likely to live in older, less energy-efficient homes and apartment complexes.

Strategy BE-3. Expand use of renewable energy: As the decarbonization strategy works to remove fossil fuel use from our buildings and the energy efficiency strategy works to reduce overall energy consumption, expanding the use of locally generated renewable energy will increase Pleasanton's general climate and energy resilience. The City will increase local renewable energy generation and storage to reduce reliance on the larger power grid and make the community less susceptible to potential energy shortages from climate impacts like heat waves. Expanding renewables and storage will increase community resilience during Power Safety Shut-off events and allow homes to maintain service during those times. The installation and maintenance of new solar technology will also support local green jobs.

Materials and Consumption: Reduce GHG emissions from materials management and consumption which will support regional waste reduction efforts.

Strategy MC-1. Increase waste diversion and optimize collection and disposal systems: Waste collection and processing release a significant amount of methane gas, a greenhouse gas with a global warming potential 84 times greater than carbon dioxide. Diverting waste from the landfill and optimizing collection and disposal not only reduces processing emissions, it increases the supply of recycled and composted content available for a variety of uses and helps improve local air and soil quality.

Water Resources Code: Reduce GHG emissions from water usage (including conveyance and prepare community water resources for a changing climate which will result in cost savings, enhance water quality and availability, improve infrastructure, and increase resiliency).

Strategy WR-1. Improve water supply and increase conservation: Water is the foundation of life, and Pleasanton has already experienced mandated water reductions due to drought conditions. The City will continue to prioritize a sustainable, healthy water supply and storage, building on the success of existing programs such as the Controller Assistant Program and Water Conservation Program. Continued success in water efficiency and conservation also ensures enough water for natural systems, increasing both ecosystem and community resilience.

Strategy WR-2. Improve stormwater resilience: To maximize water reuse and efficiency, the City will increase stormwater infrastructure resilience to prepare for changes to flow and quality. By capturing stormwater, the City can both help to reduce flooding impacts of heavy rainfall periods and improve local water supplies. These benefits support community health, reduce water bills, increase water availability for ecosystems, and may bring more green jobs to Pleasanton.

City of Pleasanton Water Shortage Contingency Plan

The Water Shortage Contingency Plan (WSCP) describes the City's strategic plan in preparation for and respond to water shortages, including water shortage stages and associated shortage response actions. The WSCP provides a guide for the City to proactively prevent catastrophic service disruptions and has been updated to be consistent with the 2018 Water Conservation Legislation requirements. As part of this WSCP, the City's legal authorities, communication protocols, compliance and enforcement, and monitoring and reporting are described. Chapter 9.30 of the Pleasanton Municipal Code supports the City's WSCP. The WSCP was last revised in June 2021.

City of Pleasanton Sewer System Management Plan

The SSMP was prepared by the City's Operations Services Department. It consists of policies, procedures, and activities that are included in the planning, management, operation, and maintenance of the City's sanitary sewer system. The SSMP aims to conduct effective management of the City's wastewater collection system, with goals of minimizing the number and impact of sanitary sewer overflows, providing adequate sewer capacity to convey peak flows, and maintaining and improving the sewer infrastructure to provide reliable service in the future. The structure (element numbering and nomenclature) of the SSMP follows the General Waste Discharge Requirements (GWDR) for Wastewater Collection Agencies. The current SSMP was adopted December 2019.

City of Pleasanton Construction and Demolition Debris Recycling Requirements

The City's Construction and Demolition Debris Recycling Requirements (Municipal Code Ch. 9.21) require building and demolition projects to provide Waste Management Plans prior to obtaining building or demolition permits. The requirements apply to the development of residential and commercial projects with a total valuation of \$125,000 or more for a building permit and demolition actions totaling \$25,000 in valuation for a demolition permit. Current requirements were established in November 2009.

City of Pleasanton 2020 Urban Water Management Plan

The purpose of the 2020 UWMP is to provide a planning tool for the City when developing and delivering municipal water supplies to the City's water service area. The 2020 UWMP provides the City with a water management action plan for guidance as water supply and demand conditions

change. The 2020 UWMP also serves as a comprehensive guide for long-term water supply planning. The City developed the 2020 UWMP in coordination with Zone 7 and the public. While preparing the 2020 UWMP, the City notified other stakeholders (e.g., Alameda County, California Water Service [Cal Water], City of Livermore, DSRSD) of its preparation, its availability for review, and the public hearing prior to adoption.

City of Pleasanton SB 1383 Action Plan

The City's SB 1383 Action Plan provides the City with a roadmap to reach compliance with the SB 1383 requirements to reduce organic waste through the expansion of its existing programs and implementation of new programs and policies. The Action Plan targets full compliance and plan fulfillment by 2024. The Action Plan includes collaboration with PGS, the Alameda County WMA, the County Department of Environmental Health, and other consultants and contractors.

Pleasanton Municipal Code

- Title 9 of the Municipal Code includes regulations pertaining to solid waste generation, disposal, and recycling.
 - Chapter 9.08 codifies the City's anti-litter ordinance.
 - Chapter 9.14 provides regulations pertaining to stormwater to ensure the future health, safety and general welfare of City citizens by eliminating the non-stormwater discharges to the municipal separate storm sewer; controlling the discharge to municipal separate storm sewers from spills, dumping or disposal of materials other than stormwater; and reducing pollutants in stormwater discharges to the maximum extent practicable. The intent of this chapter is to protect and enhance the water quality of our watercourses, water bodies and wetlands in a manner pursuant to and consistent with the Clean Water Act. (Ord. 1572 § 2, 1992).
 - Chapter 9.20 provides regulations pertaining to garbage.
 - Chapter 9.21 provides regulations pertaining to construction debris and disposal.
 - Chapters 9.22 and 9.23 provide regulations pertaining to recycling facilities and organics reduction and recycling, respectively.
 - Chapter 9.30 covers the water management plan and provides both voluntary and mandatory water conservation stages to minimize the effect of a shortage of water on the City's customers and, by means of this chapter, to adopt provisions that will significantly reduce the consumption of water over an extended period of time thereby extending the available water required for the City's customers while reducing the hardship to the greatest extent possible on or to the City and on or to the general public. This chapter is also intended to implement the Urban Water Management Plan's water shortage contingency planning and stages of action.
- Title 14 provides regulations pertaining to the use of potable and recycled water, well standards, landscape irrigation, and water quality. Title 14 is administered by the Department of Public Works (now called the Operations Services Department).
- Title 15 establishes standards and conditions relating to the use and management of the sewerage system. It also establishes uniform requirements for discharges into the wastewater collection and treatment system used jointly with other public entities who are parties to the

joint exercise of powers agreement establishing and providing for the Livermore-Amador Valley Water Management Agency, a public entity, and any successor thereto. This chapter also serves as a vehicle enabling the City to comply with and meet applicable laws, regulations, standards and conditions established by federal and State law, or by agencies thereof in implementation of such law.

3.15.4 - Project Impacts and Mitigation Measures

Significance Criteria

The City is using Appendix G of the State CEQA Guidelines as thresholds of significance for the Housing Element Update. To determine whether impacts to utilities and service systems are significant environmental effects, the following questions are analyzed and evaluated.

Would the Housing Element Update:

- a) Require or result in the relocation or construction of new or expanded water, wastewater treatment or stormwater drainage, electric power, natural gas, or telecommunications facilities, the construction or relocation of which could cause significant environmental effects?
- b) Have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry and multiple dry years?
- c) Result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?
- d) Generate solid waste in excess of State or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals?
- e) Comply with federal, State, and local statutes and regulations related to solid waste?

Approach to Analysis

For purposes of this analysis, the following thresholds are used to evaluate the significance of utilities and services systems impacts resulting from implementation of the Housing Element Update.

- Create a need for relocated, new, or expanded water supply, wastewater treatment, stormwater drainage facilities, electric power, natural gas, or telecommunications facilities, the construction of which would result in significant construction-related traffic, air quality, GHG emissions, energy, or noise impacts. Determination of significance of construction-related air quality, GHG emissions, energy, noise, and transportation impacts associated with the development of the foregoing infrastructure is based on the respective specific thresholds of significance listed in Section 3.2, Air Quality; Section 3.5, Energy; Section 3.7, Greenhouse Gas Emissions; Section 3.11, Noise; and Section 3.14, Transportation, and are addressed in those sections.

- Result in insufficient water supply to serve development consistent with the Housing Element Update’s potable water demand during normal, dry, and multiple dry years.
- Inadequate capacity at the Wastewater Treatment Plant (WWTP) to accommodate wastewater generation.
- Insufficient daily capacity or permitted daily capacity at the Vasco Road Landfill in Livermore. to serve development consistent with the Housing Element Update’s waste generation.
- Unable to comply with AB 939 solid waste diversion goals.

To analyze water supply, CEQA Guidelines Section 15155[f], which codifies the California Supreme Court’s decision in *Vineyard Area Citizens for Responsible Growth, Inc. v. City of Rancho Cordova* (2007) 40 Cal.4th 412, establishes that “[t]he analysis shall include the following:

- (1) Sufficient information regarding the project’s proposed water demand and proposed water supplies to permit the lead agency to evaluate the pros and cons of supplying the amount of water that the project will need.
- (2) An analysis of the reasonably foreseeable environmental impacts of supplying water throughout all phases of the project.
- (3) An analysis of circumstances affecting the likelihood of the water’s availability, as well as the degree of uncertainty involved. Relevant factors may include but are not limited to, drought, salt- water intrusion, regulatory or contractual curtailments, and other reasonably foreseeable demands on the water supply.
- (4) If the lead agency cannot determine that a particular water supply will be available, it shall conduct an analysis of alternative sources, including at least in general terms the environmental consequences of using those alternative sources, or alternatives to the project that could be served with available water.”

Water

A WSA was completed for the Housing Element Update by Watearth in October 2022, and is provided in Appendix H. The purpose of the WSA was to perform the evaluation required by California Water Code Sections 10910 through 10915, as established by SB 610. The WSA evaluates the adequacy of the total water supplies of the City (as the water purveyor to the potential sites for rezoning and the Dublin-Pleasanton Bay Area Rapid Transit (BART) station property), including existing water supplies and future planned water supplies, to meet the City’s existing and projected future water demands, including those future water demands associated with development consistent with the Housing Element Update, under all hydrological conditions (normal year, single dry year, and multiple dry years).

Wastewater

Wastewater production was calculated and compared with SSMP treatment capacity to determine whether wastewater treatment requirements would be exceeded. The SSMP wastewater discharge permitting requirements were also reviewed.

Stormwater

Stormwater production was calculated and compared with the City's stormwater facility treatment capacity to determine whether stormwater collection requirements would be exceeded.

Solid Waste

Solid waste production was calculated and compared with the applicable landfill capacity to determine whether landfill daily permitted capacity and total storage capacity would be exceeded. The City's solid waste regulations and policies were also reviewed.

Electricity and Natural Gas

Electricity and natural gas usage were calculated and compared to existing capacity to determine whether existing sources would meet projected demands. Section 3.5, Energy, and Section 3.7, Greenhouse Gas Emissions, also address electricity and natural gas demands.

Telecommunications

The telecommunications providers in the city were identified.

Impact Analysis**Water, Wastewater, Stormwater, Electric Power, Natural Gas, and Telecommunications**

Impact UTIL-1: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not require or result in the relocation or construction of new or expanded water, wastewater treatment or stormwater drainage, electric power, natural gas, or telecommunications facilities, the construction or relocation of which could cause significant environmental effects.

Future development would increase demand for utilities over time. Potential impacts would include greater demands for water, wastewater treatment, stormwater drainage, electrical power, natural gas, or telecommunications facilities, potentially resulting in the need for the relocation or construction of facilities to maintain utility demands. Additionally, future development would increase the use of existing utilities services, which could cause physical deterioration of public infrastructure.

Water**Infrastructure Construction, Expansion, or Relocation**

Prior to development on Sites 1 (Lester) and 22 (Merritt), those sites would be annexed into the City and would connect to existing City water infrastructure. While development facilitated by the Housing Element Update would require extension, relocation, and expansion of new water lines within and to the potential sites for rezoning and the Dublin-Pleasanton BART station property, construction activities associated with future development would be subject to compliance with the applicable local, State, and federal laws, ordinances, and regulations, as well as any project-specific mitigation measures necessary to ensure construction-related impacts are not significant. Future development would be required to uphold the goals and objectives of the General Plan and CAP 2.0 related to water facilities to ensure the adequate water treatment and distribution systems are planned for concurrent with projected growth.

As individual projects are proposed and considered for approval by the City, project proponents would be required to fund their fair share of upgrading the utility infrastructure as needed to serve a project. This may include installing water mains, new water meters, and/or upgrades to existing facilities.

The City would review individual development projects at the time of application to establish requirements for funding any infrastructure improvements necessary to mitigate project-specific impacts that have not been previously identified as part of a capital improvement program covered by development impact fees. Consistent with applicable State law, the City's development fees would ensure that the developers pay the cost attributable to the increased demand for the affected public facilities reasonably related to the development project to maintain the existing level of service and achieve an adopted level of service that is consistent with the City's General Plan and Municipal Code (California Government Code Section 66001(g)).

Therefore, impacts due to the extension, relocation, and expansion of new water facilities would be less than significant.

Wastewater

Generation

As discussed under Impact UTIL-3, there is sufficient capacity at the RWTF and LWRP to accommodate wastewater collection and treatment generated by development consistent with the Housing Element Update and impacts would be less than significant.

Infrastructure Construction, Expansion, or Relocation

General Plan Chapter 8, Water Element, Goal 5 is to provide adequate sewage treatment and minimize wastewater export. Policy 5 is to secure sewage capacity through all available means for residential, commercial, and industrial development. This policy includes a program that requires new development to pay its fair share of the City's planned sewer system improvements including treatment, distribution, reuse, and export facilities, which would be evaluated through the City's new hydraulic sewer model, which is currently being developed and is anticipated to be complete in January 2023.

Future development consistent with the Housing Element Update would be located within the urban framework of the City and near existing wastewater infrastructure. Prior to development on Sites 1 (Lester) and 22 (Merritt), those sites would be annexed into the City and would connect to existing City wastewater infrastructure. The City currently complies with the statutory requirements listed in Regulatory Framework, including Title 15 of the Municipal Code and those requirements ensure that the City would continue to comply with State and federal regulatory requirements related to wastewater. All new development would be required to pay a fair share of the City's planned sewer system improvements. Therefore, development consistent with the Housing Element Update would not result in insufficient wastewater collection and treatment and no new or expanded wastewater treatment facilities would be needed. Thus, impacts would be less than significant.

Stormwater Drainage Capacity

The City owns and maintains drainage facilities within the city limits consisting of underground pipes, local channels, and natural swales in hillside areas. These facilities carry water runoff within the drainage basin to the flood control channels (known locally as arroyos). Development projects creating or replacing over 2,500 square feet of impervious services would require satisfaction of the City's Stormwater Requirements Checklist, which would ensure the implementation of regulated stormwater infrastructure into development projects consistent with the Housing Element Update.

General Plan Chapter 8, Water Element, includes requirements for stormwater facilities. Goal 6 requires projects to minimize stormwater runoff and provide adequate stormwater facilities to protect property from flooding. Policy 8 ensures an adequate storm drainage system to serve existing and future development. Specifically, Program 8.4 requires the installation of on-site storm drainage infrastructure that would improve local storm drainage systems to accept appropriate design-year flows, as determined by the City Engineer. Section 2.8(B) of the Hacienda PUD Development Plan Design Guidelines includes requirements for storm drainage collection and requires that all development within the Hacienda PUD area provide on-site storm drainage collection compliant with Low Impact Development standards. Additional policies require reduction of stormwater runoff and maximizing infiltration of naturally occurring rainwater to improve surface and subsurface water quality, minimize impervious surfaces, and implement stormwater runoff requirements. In addition, development consistent with the Housing Element Update would be required to pay a fair share of the City's storm drainage improvement costs. Compliance with City requirements and policies would ensure that runoff would not inundate downstream storm drainage facilities such that new or expanded facilities would be required. Impacts would be less than significant.

Electric Power, Natural Gas, and Telecommunications

Future development consistent with the Housing Element Update would be located within the urban framework of the City and near existing infrastructure. Electricity, natural gas, and telecommunications utilities respond to increased demands in various ways. These may include temporary stoppages or rolling blackouts, extension of existing infrastructure, or construction of new facilities. Each of the utility providers prepares long-range plans to accommodate projected growth in their service areas. For example, PG&E provides annual sustainability reports that outline strategies to accommodate future growth and ensure reliability of electrical and natural gas service. In addition, the CAP 2.0 includes Strategy BE-1 requiring the shift from natural gas to electric in all new buildings and Strategy BE-3 increases the availability and local renewable energy to reduce overall energy consumption. These strategies will reduce the electricity and natural gas consumption for development projects consistent with the Housing Element Update. Telecommunications companies continually expand infrastructure to serve the growing population. These planning efforts consider growth projections, including the growth anticipated as part of the Housing Element Update. Because implementation of the Housing Element Update would not result in unplanned growth (see Section 3.12, Population and Housing for more information), the majority of growth would be infill. As such, the utility providers take into consideration all future growth projections in their planning efforts, the development consistent with the Housing Element Update would not be expected to require or result in new or expanded electricity, natural gas, or telecommunications

facilities beyond those already planned. Necessary extensions and/or upgrades would generally occur within existing utility easements and would be located underground, primarily within existing or planned roadways. Impacts would be less than significant.

Level of Significance

Less than significant impact.

Water Supply

Impact UTIL-2: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry and multiple dry years.

Projected Water Demand for Housing Element Update

Potable water demand is expected to differ between housing density classes. Within the potential sites for rezoning, four separate housing classes were identified for the purposes of calculating average demand, related to typical household size:

- Low Density Residential (LDR) dwelling units consisting of single-family detached homes and duplexes;³⁹
- Low/Medium Density Residential (LMDR) dwelling units consisting of small lot single-family homes and townhomes;
- Medium Density Residential (MDR) dwelling units consisting of small-scale apartment buildings and attached apartment buildings with street parking; and
- High Density Residential (HDR) dwelling units consisting of large-scale attached apartments with structured parking, condominiums, and accessory dwelling units (ADUs).

The differing projected water demand per density class is demonstrated in Table 3.15-5. Independent of the specific potential sites for rezoning, ADUs are also included in this analysis. As described in Chapter 2, Project Description, this Draft Program Environmental Impact Report (Draft Program EIR) assumes 93 ADUs with an assumed high-density housing density class; ADUs can fall within any of the potential sites for rezoning. The water use associated with the incremental increase in allowable residential units (306 units)⁴⁰ at the Dublin-Pleasanton BART station property is also included in Table 3.15-5. Projected demand of potable water at specific sites can be found in the WSA (Appendix H).

³⁹ Duplexes are included in the low-density residential designation as the City has decided this present a conservative analysis,

⁴⁰ The 2015-2023 (5th Cycle) Housing Element assumed 249 units at the property. Pursuant to AB 2923, and as evaluated in this Draft Program Environmental Impact Report (Draft Program EIR), the property would have a density of 75 dwelling unit/acre (du/acre), resulting in a total of 555 potential units, or 306 additional units to what was evaluated in the Final Supplemental Environmental Impact Report for the City of Pleasanton Housing Element and Climate Action Plan General Plan Amendment and Rezonings.

Table 3.15-5: Projected Water Demand Summarized by Density Class (2020-2045)

Density Class	Maximum Dwelling Units	2023 Total Water Demand (AFY)	2025 Total Water Demand (AFY)	2030 Total Water Demand (AFY)	2031 Total Water Demand (AFY)	2035 Total Water Demand (AFY)	2040 Total Water Demand (AFY)	2045 Total Water Demand (AFY)
LDR	204	0.00	27.04	93.93	107.53	108.24	109.14	110.03
LMDR	697	0.00	92.14	320.02	366.35	368.78	371.81	374.85
MDR	629	0.00	69.07	239.90	274.63	276.45	278.73	281.00
HDR	6,257	0.00	609.20	2,115.98	2,422.28	2,438.34	2,458.42	2,478.49
Total	7,787	0.00	796.70	2,767.23	3,167.80	3,188.80	3,215.06	3,241.31

Notes:
 AFY = acre-feet per year
 HDR = High Density Residential
 LDR = Low Density Residential
 LMDR = Low/Medium Density Residential
 MDR = Medium Density Residential
 Source: Watearth. 2022. City of Pleasanton Water Supply Assessment (WSA) for 2023-2031 Housing Element Update. October.

Sites 6 (Signature Center), 7 (Hacienda Terrace), 8 (Muslim Community Center), and 29 (Oracle) have the potential to use recycled water as the City’s recycled water infrastructure is already available in these locations. Based on the UWMP, the city’s total recycled water use in 2020 was 1,228 acre-feet, and approximately 7.67 percent of all water used in the city was from recycled water. This recycled water percentage is used to estimate the recycled water usage for Sites 6 (Signature Center), 7 (Hacienda Terrace), 8 (Muslim Community Center), and 29 (Oracle). These sites are proposed to be HDR and MDR development, so recycled water is anticipated to be used for irrigation of community green spaces, landscaping, and other uses. The total anticipated potable water and recycled water demand is provided in Table 3.15-6.

Table 3.15-6: Projected Water Demand for Development Consistent with the Housing Element Update

Water Type	2023 Water Demand (AFY)	2025 Water Demand (AFY)	2030 Water Demand (AFY)	2031 Water Demand (AFY)	2035 Water Demand (AFY)	2040 Water Demand (AFY)	2045 Water Demand (AFY)
Potable Water	0.00	790.09	2,744.29	3,141.53	3,162.36	3,188.40	3,214.43
Recycled Water	0.00	6.61	22.94	26.27	26.44	26.66	26.88
Total Water	0.00	796.70	2,767.23	3,167.80	3,188.80	3,215.06	3,241.31

Notes:
 AFY = acre-feet per year
 Source: Watearth. 2022. City of Pleasanton Water Supply Assessment (WSA) for 2023-2031 Housing Element Update. October.

Table 3.15-7 provides the comparison of the water use in 2020 with the projected demand associated with implementation of the Housing Element Update against the city’s total water demand projections for 2023, 2024, 2025, 2030, 2035, 2040, and 2045. Zone 7 has conducted studies to determine water supply during a normal, single dry year, and five consecutive year droughts. The 2020 UWMP states that Zone 7 can supply 100 percent of the water demand for the city during all conditions, and the comparison shown below would be unchanged during normal year, single dry year, and multiple dry year conditions.

Table 3.15-7: Total Projected Water Demand for Development Consistent with the Housing Element Update vs. City’s Total Water Demand Projections

Water Supply	Projected Water Demand (AFY)						
	2023	2024	2025	2030	2035	2040	2045
2020 Actual Water Use	16,007	16,007	16,007	16,007	16,007	16,007	16,007
Water Demand Associated with Housing Element Update	0	404	797	2,767	3,189	3,215	3,241
City’s Total Projected Water Demand per 2020 UWMP	17,910	18,070	18,240	18,889	19,387	20,036	20,036
Surplus	1,903	1,659	1,436	115	191	814	788
Notes: AFY = acre-feet per year							

As shown in the Table 3.15-7, the water demand projections associated with development consistent with the Housing Element Update fall within the city’s total water demand projections for all years.

Water Supply and Groundwater Contamination

As described above, because of PFAS contamination in the city’s groundwater, the City has determined that all groundwater supply wells for the city may be taken out of commission no later than the first quarter of 2023. Currently, groundwater makes up approximately 20 percent of the total water supply for the City, and, if the existing groundwater supply wells are taken out of commission, this 20 percent will not be available to the City without treatment or additional supply sources. Zone 7 has not identified any impacts to Zone 7’s water supply for the city as a result of the elevated pollutants of concern in groundwater. The elevated pollutant level in the city’s groundwater supply directly affects water supply available from local groundwater supply wells for any development application consistent with the Housing Element Update.

The City’s total projected water supply minus the approximate 20 percent groundwater supply is shown in Table 3.15-8 for the years 2023, 2024, 2025, 2030, 2035, 2040, and 2045. These updated values represent the projected water supply available for the City after decommission of the groundwater wells.

Table 3.15-8: Total Projected Water Demand for Development Consistent with the Housing Element Update vs. City’s Total Water Demand Projections Minus Groundwater Supply

Projected Water Demand (AFY)							
Water Supply	2023	2024	2025	2030	2035	2040	2045
2020 Actual Water Use	16,007	16,007	16,007	16,007	16,007	16,007	16,007
Water Demand Associated with Housing Element Update	0	404	797	2,767	3,189	3,215	3,241
City’s Total Projected Water Supply per 2020 UWMP Minus 20 Percent to Account for Groundwater	14,328	14,456	14,592	15,111	15,510	16,029	16,029
Deficiency	(1,679)	(1,955)	(2,212)	(3,663)	(3,686)	(3,193)	(3,219)
Notes: AFY = acre-feet per year							

As shown in Table 3.15-8, with all the City’s groundwater supply wells being taken out of commission, and unless the supply is either replaced or restored, there would be a significant projected water supply deficiency for all years reported in this analysis. The deficiency ranges from approximately 12 percent to approximately 25 percent. Without the groundwater supply, there would not be enough water available to account for development consistent with the Housing Element Update unless alternative water supplies are identified, such as purchasing additional water from Zone 7 Water Agency. Although Zone 7 has sufficient supplies available, because the City is still evaluating options for additional water and has not finalized additional supplies at the time of publication of this Draft Program EIR, the potential water supply deficiency is considered significant for the purpose of this analysis.

Alternative Water Supply Options

Because of the 2019 and 2020 PFAS groundwater investigation, the City is actively exploring alternative water supply options to address the loss of groundwater while the PFAS contamination is being addressed. The City began considering a PFAS and Groundwater Wells Rehabilitation Project to address PFAS contamination, and proceeded with work to implement this project including preparation of designs and CEQA review. The project is intended to extend, by 30 years, the life of the existing groundwater supply wells as safe, reliable, and locally controlled. The project would include the following components:

- Rehabilitate the existing Well 8 facility (out of commission since 2019) and restore its original pumping capacity;
- Construct a new Well 9 facility to replace existing Well 5 facility;
- Rehabilitate existing Well 6 facility (to be renamed Well 10) including construction of a new well casing. The existing pumping capacity would be maintained;
- Construct a Centralized Treatment Facility (CTF) for disinfection, fluoridation, and PFAS treatment of the City’s groundwater prior to distribution;

- Install pipeline to convey raw groundwater from the well facilities to the CTF; and
- Replace and upsize 1,600 feet of treated water distribution main to allow the treated groundwater to be distributed from a centralized location.

The estimated cost of the project is 46 million dollars and is being updated to reflect the current state of the economy. All environmental applications have been submitted; however, financial commitments, such as grants or City funding mechanisms, have not been finalized. Although this project would remediate the elevated PFAS levels, the Pleasanton City Council voted to pause the project and evaluate alternatives to address the water wells for the following reasons:

- The project construction cost may rise as much as 30 percent more than originally budgeted due to economic conditions and inflation;
- The City does not currently own or operate a water treatment plant, and the proposed PFAS treatment facility would require additional staff and significant operational costs;
- A changing regulatory environment would continue to add uncertainty and potential liability to the City; and acceptable contaminant levels are declining and may require continual changes in treatment techniques and technologies required.

With the suspension of the Groundwater Wells Rehabilitation Project, more alternative water supply options are being considered by the City to replace the deficiency associated with the loss of groundwater supply. The additional options being considered include the following:

- Drilling of new City wells with or without PFAS treatment, depending on the location of the wells. This option would require test drilling and groundwater sampling;
- Discussion between Zone 7 and the City have taken place with the option of Zone 7 providing 100 percent of all water supply, both in the near term and in the future; and
- Consideration of purchasing water supply from outside Zone 7.

It is important to note that City staff, in recommending the project pause, indicated that the treatment and rehabilitation project remains a viable option. As such, the City could opt to re-start work on the well rehabilitation and treatment project at the conclusion of their review.

Water Supply Analysis

It should be noted the water demand analysis is conservative. The average daily water demand per capita in this assessment of 159 GPCD is based on total water used in 2020, which includes residential, commercial, industrial, and landscape consumption combined. The residential portion makes up approximately 62 percent of all water used. Additional water uses within residential developments like community green spaces, trees, landscaping, and shrubbery require additional water use. Therefore, the conservative value of 159 GPCD was used to account for these additional demands. In addition, more water conservation measures may take effect in the coming years that could decrease water use per capita.

The WSA conservatively analyzes impacts of development consistent with the Housing Element Update and includes an assumption of *maximum* allowable density for the potential sites for rezoning and the Dublin-Pleasanton BART station property, which means the analysis evaluates significantly more residential units than are needed to strictly meet the Regional Housing Need Allocation assigned to the City for the forthcoming 8-year Housing Element Update cycle. The City has discretion to identify the appropriate housing sites to meet Housing Element Update objectives, provided that such sites are determined to have sufficient realistic development capacity to accommodate the Regional Housing Needs Allocation (RHNA). As such, it is possible that not all the sites analyzed in this WSA would be subject to rezoning, nor that every site will develop at its maximum allowable density. Finally, the analysis assumed that in every case, new residential development would be additive to any existing uses on a site, when in fact it is likely that new housing would replace all or some of those uses. All of these factors mean that this approach provides a conservative analysis with respect to water supply/demand impacts.

In addition to the above, conservative assumptions, future development facilitated by the Housing Element Update would be built using new building standards for water efficiency and would be designed to use less water than existing development. Future development facilitated by the Housing Element Update would also occur incrementally over time, based on market conditions and other factors, such that existing water services are not overburdened by substantially increased demands at any single point in time.

The General Plan includes goals and policies to help conserve water. Chapter 8, Water Element, of the General Plan Goal 1, “preserve and protect water resources and supply for long-term sustainability,” includes Policy 1 that ensures sustainability by promoting the conservation of water resources. Goal 4 is to provide sufficient water supply and promote water safety and security and includes policies to ensure an adequate water system and a high-quality water supply for existing and future development as well as to maintain an adequate reserve of water in storage facilities. The CAP 2.0 also includes Strategy WR-1, which focuses on the prioritization of a sustainable, healthful water supply and storage. Finally, the Water Element includes policies and goals to ensure that the provision of water to supply development consistent with the Housing Element Update does not result in environmental effects. Policy 3 includes several programs to protect the quality and quantity of surface water and groundwater resources in the city. For example, Program 3.1 prohibits the use of water reclamation techniques which could adversely affect or have potentially negative impacts groundwater resources.

Therefore, because the analysis provided herein was conducted on a conservative basis, it is likely that the margin of undersupply would be substantially less than what is enumerated above, and possible even within the range of available supply with or without the replacement of groundwater supply that may be taken off-line in 2023. Nevertheless, because supply replacement options have not been confirmed and a final decision has not been made to replace the groundwater supply, this analysis concludes decommissioning the City’s groundwater supply wells would result in projected water supply that would not be sufficient to accommodate development consistent with the Housing Element Update, and there is no mitigation available that could with certainty, reduce impacts to a less than significant level. Therefore, this impact would remain significant and unavoidable.

Level of Significance Before Mitigation

Potentially significant impact.

Mitigation Measures

None available.

Level of Significance After Mitigation

Significant and unavoidable.

Wastewater Treatment Capacity

Impact UTIL-3: **Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the project’s projected demand in addition to the provider’s existing commitments.**

As described in Chapter 2, Project Description, the Housing Element Update could result in a maximum of 7,787 new dwelling units and a maximum of 18,029 residents. Development and growth in the city would increase demand for wastewater treatment capacity. Utilizing an industry standard of wastewater generation at 90 percent of water demand, the projected maximum wastewater generation for development consistent with the Housing Element Update would equal approximately 2.17 mgd.⁴¹

The RWTF and LWRP serving the City of Pleasanton would have a combined capacity to treat up to 26.1 mgd plus the current LAVWMA pipeline discharge capacity of 41.2 mgd. The 2.17 mgd of wastewater generated by new development consistent with the Housing Element Update would represent less than 5 percent of total treatment capacity of the RWTF and LWRP. Therefore, even with the conservative assumptions included as part of this Draft Program EIR, the RWTF and LWRP would have capacity to handle the increase in wastewater associated with implementation of the Housing Element Update. The discharge of wastewater would be regulated by the NPDES program to ensure less than significant environmental impacts.⁴²

The City has entered into numerous sewage reservation agreements that guarantee capacity to various properties/projects. Most approved, but not yet constructed, commercial/office development utilize capacity the City has “reserved” for them out of its original sewage treatment plant and wastewater discharge capacities. Because the City has secured both treatment plant and export capacity by agreement with the DSRSD and its participation in the LAVWMA Expansion Project, sewage treatment and disposal capacity is not a constraint in the short- or mid-term. Therefore, the City has secured capacity for its continued existing and future wastewater flows. In

⁴¹ $3,241 \text{ AFY} = 879,370,000 \text{ gallons/year} / 365 \text{ days} = 2.41 \text{ mgd} \times .9 = 2.17 \text{ mgd}$.

⁴² Refer to Section 3.9, Hydrology and Water Quality for additional information about the NPDES program.

addition, the City's capacity in the discharge pipeline would allow growth in dry-weather flows as well as accommodate its wet-weather flows for many future years.^{43,44}

The General Plan includes policies and actions to ensure that wastewater treatment capacity keeps pace with new development. Chapter 8, Water Element, of the General Plan Goal 5 is to provide adequate sewage treatment and minimize wastewater export. Policy 5 requires the City to secure sewage capacity through all available means for residential, commercial, and industrial development. All new development is required to pay its fair share of the City's planned sewer system improvements including treatment, distribution, reuse, and export facilities. Policy 6 provides for approval of only those sewage collection, treatment, and export expansion alternatives which are cost- and energy efficient and do not create a health hazard, and Policy 7 supports cost-effective and environmentally sensitive approaches to wastewater reuse in the Tri-Valley.

New development would be subject to the latest adopted edition of the California Plumbing Code and CALGreen Code including the provisions for water efficient fixtures and toilets, which would reduce the amount of effluent entering the wastewater system. Dwelling units constructed consistent with the Housing Element Update would be predominantly on vacant or underutilized parcels and would be connected to the municipal sewer system. Prior to development on Sites 1 (Lester) and 22 (Merritt), those sites would be annexed into Pleasanton and would connect to City's wastewater infrastructure. Fair share fees would be required for all new development, as noted.

The City maintains a SSMP as required under the Statewide GWDR for Sanitary Sewer Systems. The SSMP is audited bi-annually and updated every 5 years. These updates allow for the consideration of development and redevelopment such as would occur consistent with the Housing Element Update. As such, the potential for increased wastewater generation and its need for transmission has been and would continue to be planned for by the City. Moreover, increasing use of the wastewater collection systems and treatment plants would not result in significant adverse impacts to the environment because existing and future collection systems and treatment plants would comply with federal, State, and local regulations regulating wastewater collection and discharge.

In conclusion, while development consistent with the Housing Element Update would result in an increase in the demand for wastewater collection and treatment, the wastewater collection systems and treatment plants have sufficient capacity to support new development within the service area. The City's sewer connection fees would reduce impacts caused by future development and redevelopment in the City by financing the replacement and renewal of existing sanitary sewer facilities and the upgrade and construction of new sanitary sewer facilities. These upgrades would be evaluated through the City's new hydraulic sewer model, which is currently being developed and is anticipated to be complete in January 2023. Therefore, impacts related to wastewater collection and treatment would be less than significant.

Level of Significance

Less than significant impact.

⁴³ City of Pleasanton. 2019. Sewer System Management Plan. December.

⁴⁴ City of Pleasanton. 2009. Pleasanton General Plan 2005-2025. Section 8—Water Element. July

Landfill Capacity and Solid Waste Reduction Goals Consistency

Impact UTIL-4: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not generate solid waste in excess of State or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals. In addition, the development consistent with the Housing Element Update would comply with federal, State, and local statutes and regulations related to solid waste.

As described in Chapter 2, Project Description, the Housing Element Update could result in a maximum of 7,787 new dwelling units and 18,029 new residents. Development and growth in the city would increase the generation of solid waste (both temporary construction and permanent operation waste) which could exceed State or local standards, exceed local infrastructure capacity, or otherwise impair the attainment of solid waste reduction goals.

The Vasco Road Landfill in Livermore has a site area of 644 acres and a permitted landfill area of 246 acres. Its maximum permitted quantity is 2,518 tons per day.⁴⁵ In 2018, Vasco Road received an estimated 684,596 tons of waste. Of this amount, the landfill received approximately 286,575 tons (1,500 tons per day) of waste disposal, including 251,273 tons of municipal solid waste, with the remainder materials used for alternative daily cover materials,⁴⁶ third-party recycling, special waste, and soils. In 2018, Vasco Road also received about 21,209 tons of recyclable materials (20 tons per day). Approximately 79.4 percent of this flow is from Alameda County. As of 2018, the Vasco Road Landfill reported remaining capacity for about 6 million cubic yards (5.5 million tons) of waste. The estimated closure year for the Vasco Road Landfill is 2035. Vasco Road Landfill's permitted capacity per its Solid Waste Facility Permit is 32.97 million cubic yards.⁴⁷ The CoIWMP indicated that the city had a per capita waste disposal rate of 7.2 pounds per capita per day in 2018. Based on the CoIWMP per capita waste disposal rate, development consistent with the Housing Element Update could generate a maximum of approximately 129,809 pounds per day, equivalent to approximately 47,380,212 pounds per year or approximately 23,690 tons per year. Given a remaining capacity of 5.5 million tons at the Vasco Road Landfill through 2035, the solid waste generated by development consistent with the Housing Element Update would represent less than .05 percent of the remaining landfill capacity.

The General Plan includes policies and programs to reduce and divert solid waste. Chapter 6, Public Facilities and Community Programs Element, of the General Plan Goal 10 is to meet or exceed State and County standards for source reduction and waste diversion, including the countywide goal of 75 percent reduction of waste going to landfills. Policy 25 promotes development of programs that model best practices in source reduction, waste diversion, and use of recycled products. Policy 26 minimizes the City's generation of solid waste materials by supporting the CoIWMP and Source Reduction and Recycling Plan and by developing City recycling programs using the California Diversion rate methodology for measurement. Each of these policies includes programs to promote

⁴⁵ Alameda County Waste Management Authority (WMA). 2020. Alameda County Integrated Waste Management Plan (CoIWMP). April.

⁴⁶ Alternative daily cover material is material other than earthen material placed on the surface of the active face of a municipal solid waste landfill at the end of each operating day to control vectors, fires, odors, blowing litter, and scavenging.

⁴⁷ Alameda County Waste Management Authority (WMA). 2020. Alameda County Integrated Waste Management Plan (CoIWMP). April.

recycling and waste reduction. The CAP 2.0 also includes strategies for reducing the generation of solid waste, including Strategy MC-1, which emphasizes diverting waste from landfills and optimizing collection and disposal. In accordance with City requirements, development consistent with the Housing Element Update would be required to be served with solid waste, recycling, and green waste services provided by the City's franchise hauler (Municipal Code Chapter 9.20). Additionally, construction and demolition debris from new development would be required to be recycled (Municipal Code Chapter 9.21) and organics waste reduced or recycled (Municipal Code Chapter 9.23). Statewide ordinances, including AB 341, AB 939, and SB 1016 require waste reduction, recycling, and diversion and would also be applicable to development consistent with the Housing Element Update.

Construction waste would be temporary and would be required to be diverted from landfills in accordance with Municipal Code Chapter 9.21. As indicated in the Construction and Demolition Debris Recycling Ordinance, a Waste Management Plan must be submitted for approval for all projects with a construction valuation of \$125,000 or greater, or a demolition valuation of \$25,000 or greater. The Waste Management Plan must include waste diversion data for the construction project. Diversion efforts could include deconstructing and salvaging all or part of structures to be demolished (as practicable) and directing one hundred percent of inert solids to reuse or recycling facilities approved by the City. In addition, diversion could be accomplished by either taking all mixed construction and demolition debris to mixed construction and demolition debris recycling facilities approved by the City and taking all sorted or crushed construction and demolition debris to approved facilities, or source separating noninert materials such as cardboard and paper, wood, metals, green waste, new gypsum wallboard, tile, porcelain fixtures, and other easily recycled materials, and directing them to recycling facilities approved by the City and taking the remainder to a facility for disposal.

As described above, there is sufficient permitted capacity at the Vasco Road Landfill to accommodate the solid waste generated by development consistent with the Housing Element Update. Furthermore, as previously discussed, all future development consistent with the Housing Element Update would be required to abide by and be consistent with federal, State, and local statutes and regulations related to solid waste, including the California Health and Safety Code, California Code of Regulations, California Public Resources Code, General Plan, and Municipal Code. Therefore, the impact would be less than significant.

Level of Significance

Less than significant impact.

3.15.5 - Cumulative Impacts

This analysis evaluates whether the impacts of the Housing Element Update, together with the impacts of cumulative development, would result in a cumulatively significant impact with respect to water supply, wastewater, solid waste, storm drain facilities, electric power, natural gas, or telecommunications facilities. This analysis then considers whether incremental contribution of impacts associated with the implementation of the Housing Element would be significant. Both conditions must apply for a project's cumulative effects to rise to the level of significance.

Water

The geographic context for the analysis of cumulative impacts related to water supply includes the Zone 7 service area. Each individual project would be required to demonstrate the availability of water to service the development, including the completion of a WSA and water supply verification, if applicable. All cumulative projects would be subject to local, State, and federal regulations and permit requirements and would be required to comply with City/County ordinances and General Plan policies, as well as other regulations that address water supply. These regulations would be implemented in conjunction with other State, County, and local water conservation requirements and water-efficiency measures. Additionally, all future development would be required to pay fair share fees for infrastructure improvements to ensure infrastructure keeps pace with development. For these reasons, cumulative impacts are less than significant.

Though it is not required for planning level documents such as the Housing Element Update, as part of this cumulative analysis, the City is providing an analysis of the projected water demand for additional growth in the City of Pleasanton. As discussed in Chapter 2, Project Description, there is existing residential zoned capacity and approved but not yet constructed projects that could result in additional housing within the city. Based on residential units/capacity for the existing sites zoned for residential uses, projected ADUs (8-year projection, based on the last 5 years of average annual production), and pipeline projects (projects entitled but not yet built), the number of units that could be built within Pleasanton would be 2,486 units with a population increase of 5,963.

The projected water demand was calculated, in AFY, for sites expecting additional growth in a comparable way to the projected water use associated with development consistent with the Housing Element Update as described in more detail in the WSA. Table 3.15-9 shows projected water demand by additional growth site type, density class, and expected number of dwelling units for the years 2023, 2025, 2030, 2031, 2035, 2040, and 2045.

Table 3.15-9: Total Projected Water Demand for Development Consistent with the Housing Element Update and Additional Growth

Site Type	Maximum or Expected No. Dwelling Units	2023 Total Water Demand (AFY)	2025 Total Water Demand (AFY)	2030 Total Water Demand (AFY)	2031 Total Water Demand (AFY)	2035 Total Water Demand (AFY)	2040 Total Water Demand (AFY)	2045 Total Water Demand (AFY)
Housing Element Update	7,787	0.00	796.70	2,767.23	3,167.80	3,188.80	3,215.06	3,241.31
Additional Growth	2,486	0.00	197.93	687.47	786.99	867.20	968.85	1,072.05
Total	10,273	0.00	994.63	3454.70	3954.79	4056.00	4,183.91	4,313.36
Notes: AFY = acre-feet per year								

Table 3.15-10 provides the comparison of the water use in 2020 with the projected demand associated with implementation of the Housing Element Update and additional growth against the city’s total water demand projections for 2023, 2024, 2025, 2030, 2035, 2040, and 2045 minus the approximate 20 percent groundwater supply. Zone 7 has conducted studies to determine water supply during a normal, single dry year, and five consecutive year droughts. The 2020 UWMP states that Zone 7 can supply 100 percent of the water demand for the city during all conditions, and the comparison shown below would be unchanged during normal year, single dry year, and multiple dry year conditions.

Table 3.15-10: Total Projected Water Demand for Development Consistent with the Housing Element Update and Additional Growth vs. City’s Total Water Demand Projections

Water Supply	Projected Water Demand (AFY)						
	2023	2024	2025	2030	2035	2040	2045
2020 Actual Water Use	16,007	16,007	16,007	16,007	16,007	16,007	16,007
Water Demand Associated with Housing Element Update	0	404	797	2,767	3,189	3,215	3,241
Water Demand Associated with Additional Growth	0	100	198	687	867	969	1,072
Total Projected Water Demand for Housing Element Update and Additional Growth	0	504	995	3,454	4,056	4,184	4,313
City’s Total Projected Water Supply per 2020 UWMP Minus 20 Percent to Account for Groundwater	14,328	14,456	14,592	15,111	15,510	16,029	16,029
Deficiency	(1,679)	(2,055)	(2,410)	(4,350)	(4,553)	(4,162)	(4,291)
Notes: AFY = acre-feet per year							

As shown in Table 3.15-10, assuming all the City’s groundwater supply wells are taken out of commission, without the supply being either replaced or restored, there would be a significant projected water supply deficiency for all years reported in this analysis. The deficiency ranges from approximately 12 percent to approximately 30 percent. Without the groundwater supply, there would not be enough water available to account for development consistent with the Housing Element Update and additional growth. In addition, as discussed in the WSA, based on 2020 UWMP reported City water supply and demand values, the decommissioning of all City groundwater wells would create a projected water supply deficiency in the City even without implementation of the Housing Element Update. As discussed above under Impact UTIL-2, the City is actively exploring alternative water supply options to account for the loss of groundwater supply, including, but not limited to, treatment facilities and purchasing additional water supplies. However, supply replacement options have not been confirmed and a final decision has not been made to replace the groundwater supply. Therefore, although the analysis provided in this Draft Program EIR is conservative, decommissioning all of the City’s ground water supply wells would result in projected

water supply that would not be sufficient to accommodate cumulative development. Because of the nature of the water supply deficiency as described above, if all groundwater supply wells are taken out of commission without the supply being replaced or restored, there would be no other mitigation available to reduce this cumulative impact to a less than significant level. Therefore, this cumulative impact would be significant and unavoidable.

Development consistent with the Housing Element Update would be required to follow multiple water reduction policies outlined in the General Plan, Municipal Code, and CAP 2.0 and conform to federal, State, and local policies that would reduce water supply impacts to less than significant levels. Additionally, development consistent with the Housing Element Update would be required to pay fair share fees for infrastructure improvements to ensure water infrastructure keeps pace with development. When applicable, any additional new development consistent with the Housing Element Update would be subject, on a project-by-project basis, to independent CEQA review and to implement mitigation, as appropriate. However, as discussed under Impact UTIL-2, development consistent with the Housing Element Update would result in a significant unavoidable impact with respect to water supply and the Housing Element Update's incremental contribution to the cumulative impact is significant. Although the City is actively evaluating options and alternatives, it is too early in the review process to identify any particular specific alternative at this time and any attempt to do so would be entirely speculative. Additionally, because of the nature of the water supply deficiency as described above, if the groundwater wells are taken out of commission without being replaced or restored, there is no other mitigation available to reduce this impact to a less than significant level; therefore, development consistent with the Housing Element Update's contribution to cumulative water supply impacts would be cumulatively considerable.

Wastewater

The geographic context for the analysis of cumulative impacts related to wastewater conveyance and treatment includes the wastewater service areas of the RWTF and the LWRP. All cumulative projects would be required to comply with the applicable City ordinances and General Plan policies, as well as other regulations related to wastewater collection and treatment. Pursuant to Chapter 8, Water Element, of the General Plan Goal 5, Policy 5, cumulative development would be required to pay its fair share of the City's planned sewer system improvements including treatment, distribution, reuse, and export facilities. As such, cumulative impacts to wastewater would be less than significant.

The Housing Element Update's contribution to less than significant cumulative impacts would not be cumulatively considerable. While development consistent with the Housing Element Update would result in an increased demand for wastewater collection and treatment, such wastewater collection and treatment can be accommodated by existing and planned infrastructure (see Impact UTIL-3). In addition, development consistent with the Housing Element Update would be required to comply with applicable requirements of the General Plan and Municipal Code that aim to reduce wastewater generation flows. Pursuant to Chapter 8, Water Element, of the General Plan Goal 5, Policy 5, development consistent with the Housing Element Update would be required to pay its fair share of the City's and DSRSD's planned sewer system improvements including treatment, distribution, reuse, and export facilities. For the reasons described above, impacts associated with the Housing Element Update related to wastewater conveyance and treatment in conjunction with other cumulative

development would not be cumulatively considerable. The Housing Element Update's incremental contribution to cumulative impacts would be less than significant.

Storm Drainage

The geographic context for analysis of cumulative impacts to storm drain facilities includes the lands within the City and its Sphere of Influence (SOI). In accordance with City requirements (Program 8.4), new cumulative development would be required to install on-site storm drainage infrastructure that would improve local storm drainage systems to accept appropriate design-year flows, as determined by the City Engineer. In addition, all cumulative projects would be required to comply with City and County ordinances and General Plan policies, as well as other regulations that minimize stormwater runoff, such as the CWA. Furthermore, cumulative projects creating or replacing over 2,500 square feet of impervious services would require satisfaction of the City's Stormwater Requirements Checklist, which would ensure the implementation of regulated stormwater infrastructure into cumulative development. In addition, cumulative development would be required to pay a fair share of the City's storm drainage improvement costs. For these reasons, cumulative impacts to storm drainage would be less than significant.

As discussed under Impact UTIL-1, the Housing Element Update's contribution to less than significant cumulative impacts would not be cumulatively considerable. The General Plan contains policies and programs to reduce stormwater runoff, as described in more detail under Impact UTIL-1. Likewise, the sections of the Municipal Code that protect water quality, such as Title 14 and Chapter 9.14, also minimize stormwater runoff. Development consistent with the Housing Element Update would also be required to comply with the CWA and regulations enforced by the RWQCB. In addition, development consistent with the Housing Element Update would be required to pay a fair share of the City's storm drainage improvement costs. Therefore, as discussed, development consistent with the Housing Element Update would have a less than significant contribution to cumulative impacts.

For the reasons described above, impacts associated with the Housing Element Update related to storm drainage in conjunction with other cumulative development would not be cumulatively considerable. The Housing Element Update's incremental contribution to cumulative impacts would be less than significant.

Solid Waste

The geographic context for the analysis of cumulative impacts related to solid waste includes the jurisdictions that are served by the Vasco Road Landfill and the Altamont Landfill (which also serves Alameda County). Cumulative development within the city would contribute to an incremental increase in solid waste delivered to these landfills and other landfills in the region. Other future projects within the cumulative geographic context would be required to comply with federal, State, and local laws and policies to address potential impacts related to solid waste, including the diversion of solid waste. For these reasons, cumulative impacts to solid waste would be less than significant.

Additionally, the Housing Element Update's contribution to less than significant cumulative impacts would not be cumulatively considerable. While development and growth consistent with the

Housing Element Update would result in an increased generation of solid waste, the Vasco Road Landfill has sufficient capacity to serve development consistent with the Housing Element Update (see Impact UTIL-4). In addition, development consistent with the Housing Element Update would be required to comply with policies and programs of the General Plan and the regulations of the Municipal Code that aim to divert solid waste from the local landfill. The City would also be required to comply with applicable federal, State, and local statutes and regulations related to solid waste (See UTIL-4). For the reasons described above, impacts associated with the Housing Element Update related to landfill capacity and solid waste reduction goals consistency in conjunction with other cumulative development would not be cumulatively considerable. The Housing Element Update's incremental contribution to cumulative impacts would be less than significant.

Electricity and Natural Gas

Cumulative analysis with respect to electricity and natural gas is addressed in Section 3.5, Energy.

Telecommunications

Cumulative projects would increase demand for internet and telephone services provided by local telecommunications providers. Much of the Tri-Valley Planning Area includes urbanized uses and cumulative development would be in areas with access to telecommunications facilities, and telecommunications companies continually expand infrastructure to serve the growing population. These cumulative projects would coordinate with telecommunication providers to provide service and would be required to ensure there is sufficient capacity to serve each project, through analysis and adequate mitigation, as necessary. For these reasons, cumulative impacts with respect to telecommunications would be less than significant.

As described in Impact UTIL-1, because implementation of the Housing Element Update would not result in unplanned growth (see Section 3.12, Population and Housing for more information), the majority of growth would be infill, and because the utility providers take into consideration all future growth projections in their planning efforts, the development consistent with the Housing Element Update would not be expected to require or result in new or expanded telecommunications facilities beyond those already planned. Development consistent with the Housing Element Update would also coordinate with telecommunication providers to provide service, and the Housing Element Update's contribution to the less than significant cumulative impact would not be cumulatively considerable. Therefore, the Housing Element Update, in conjunction with other cumulative projects, would result in a less than significant cumulative impact related to telecommunications.

Level of Cumulative Significance Before Mitigation

Potentially significant cumulative impact with respect to water supply.

Cumulative impacts related to wastewater, storm drainage, solid waste, electricity and natural gas, and telecommunications are less than significant.

Cumulative Mitigation Measures

None available.

Level of Cumulative Significance

Significant and unavoidable impacts with respect to water supply.

Cumulative impacts related to wastewater, storm drainage, solid waste, electricity and natural gas, and telecommunications are less than significant.

3.16 - Wildfire

3.16.1 - Introduction

This section of the Draft Program Environmental Impact Report (Draft Program EIR) analyzes impacts related to wildfire for the proposed 2023-2031 (6th Cycle) Housing Element Update, rezonings, and General Plan and Specific Plan Amendments (collectively referred to herein as the Housing Element Update). The descriptions and analysis in this section are based, in part, on statements, data, and figures provided by the City of Pleasanton General Plan (General Plan), Pleasanton Municipal Code (Municipal Code), the Tri-Valley Local Hazard Mitigation Plan (LHMP), and California Department of Forestry and Fire Protection (CAL FIRE) Fire Hazard Severity Zone Maps. See Section 3.13, Public Services and Recreation, for a discussion of fire protection services.

Future projects consistent with the Housing Element Update will be evaluated for project-specific impacts with respect to wildfire at the time they are proposed.

3.16.2 - Environmental Setting

Wildfires are a significant concern throughout the State. Approximately 85 percent of all fire ignitions in California are the result of human activities, and the rest are a result of lightning.¹ The California wildfire season usually takes place between spring and late fall.² Wildfire risk is determined by a combination of factors including precipitation, winds, temperature, and landscape and vegetation conditions. In addition to the direct impacts of wildfire, smoke can be a significant source of air quality pollution. Emissions from wildfires can lead to excessive levels of particulate matter, carbon monoxide (CO), nitrogen oxides (NO_x), and various volatile organic compounds (VOC).

Wildfire Hazard Area Designations

While most of California is subject to some degree of fire hazard, there are specific features that make some areas more hazardous. CAL FIRE is required by law to map areas of significant fire hazards based on fuels, terrain, weather, and other relevant factors. These designations, referred to as Fire Hazard Severity Zones (FHSZ), mandate how people construct buildings and protect property to reduce risk associated with wildland fires.³

The CAL FIRE FHSZ maps denote hazards in State Responsibility Areas (SRA) and Local Responsibility Areas (LRA). SRA are areas where the State has financial responsibility for wildland fire protection and prevention. Incorporated cities and federal ownership are not included. Within the SRA, CAL FIRE is responsible for fire prevention and suppression. LRA are incorporated cities, urban regions, agriculture lands, and portions of the desert where the local government is responsible for wildfire protection. This is typically provided by city fire departments, fire protection districts, and counties

¹ California Energy Commission (CEC). 2018. Statewide Summary Report. California's Climate Change Assessment. Publication number: SUM-CCCA4-2018-013. Website: https://www.energy.ca.gov/sites/default/files/2019-11/Statewide_Reports-SUM-CCCA4-2018-013_Statewide_Summary_Report_ADA.pdf. Accessed June 22, 2022.

² Bay Area Air Quality Management District (BAAQMD). 2022. Wildfire Safety. Website: <https://www.baaqmd.gov/about-air-quality/wildfire-air-quality-response-program/wildfire-safety>. Accessed June 22, 2022.

³ California Department of Forestry and Fire Protection (CAL FIRE). 2022. Fire Hazard Severity Zones web page. Website: <https://osfm.fire.ca.gov/divisions/community-wildfire-preparedness-and-mitigation/wildfire-preparedness/fire-hazard-severity-zones/>. Accessed June 9, 2022.

and by CAL FIRE under contract. Per law, only lands zoned as Very High Fire Hazard Severity Zones (VHFHSZ) are identified within LRA.⁴

According to CAL FIRE, and as shown in Exhibit 3.8-3 in Section 3.8, Hazards and Hazardous Materials, most of the developed areas within the City of Pleasanton (City) are not within a LRA VHFHSZ; the eastern, southern, southeastern, and southwestern portion of the city are within moderate and high FHSZ LRA, and a small portion of the southwestern portion of the city is within a very high FHSZ LRA. A small portion of the southwestern portion of Site 2 (Merritt) is within a moderate and high FHSZ LRA, Site 23 (Sunol Boulevard) is within a high FHSZ LRA to the west, most of Site 26 (St. Augustine) is within a moderate FHSZ LRA, Site 27 (PUSD-Vineyard) is within a high FHSZ LRA, and the land to the north of Site 21a and b (Kiewit) is designated as a moderate FHSZ LRA.

A small portion of the east of the city is within a moderate FHSZ SRA and a small southern portion of the city is within a moderate and high FHSZ SRA. There are also lands within a high FHSZ SRA to the northwest of the city, past the city limits and a portion of land mapped moderate FHSZ SRA to the northeast of the city limits. The entirety of Site 1 (Lester) is within a high FHSZ SRA and the southern portion of Site 22 (Merritt) the portion not mapped as a VHFHSZ LRA) is within a moderate FHSZ, with the easternmost portion of the site mapped as a VHFHSZ SRA.⁵

The Dublin-Pleasanton Bay Area Rapid Transit (BART) station property is not mapped within a FHSZ LRA or SRA. The land just north of the Dublin-Pleasanton BART station property is mapped as a moderate FHSZ Federal Responsibility Area (FRA).

Much of the outer areas of the city are identified as a Community at Risk from Wildfire by CAL FIRE's Fire and Resource Assessment Program (FRAP). Communities at Risk from Wildfire are those places within 1.5 miles of areas of High or Very High wildfire threat as determined by CAL FIRE FRAP fuels and hazard data.⁶ Additionally, Sites 1 (Lester), 22 (Merritt), and 27 (PUSD-Vineyard) are located in Special Fire Protection Areas as designated by the General Plan.

Wildfire-conducive Conditions

Grassland or other vegetation in California is easily ignited, particularly in dry seasons. Wildfire is a serious hazard in high dry fuel load areas, particularly near areas of natural vegetation and steep slopes since fires tend to burn more rapidly on steeper terrain. These fires are relatively easily controlled if they can be reached by fire equipment; burned slopes, however, are highly subject to erosion and gullyng. While brushlands are naturally adapted to frequent light fires, fire protection in recent decades has resulted in heavy fuel accumulation on the ground. Wildfire is also a serious hazard in areas of high wind, given that fires will travel faster and farther geographically when winds

⁴ California Department of Forestry and Fire Protection (CAL FIRE). 2022. Fire Hazard Severity Zones web page. Website: <https://osfm.fire.ca.gov/divisions/community-wildfire-preparedness-and-mitigation/wildfire-preparedness/fire-hazard-severity-zones/>. Accessed June 9, 2022.

⁵ California Department of Forestry and Fire Protection (CAL FIRE). 2022. Fire and Resource Assessment Program (FRAP). Communities at Risk from Wildfire map. Website: https://frap.fire.ca.gov/media/10291/commatrisk_19_ada.pdf. Accessed June 13, 2022.

⁶ Ibid.

are higher. Furthermore, wildfire is more likely in areas where electric power lines are located above ground where they may encounter vegetation or building materials.

City of Pleasanton

Fire hazards present a considerable issue to the human environment and to vegetation and wildlife habitats throughout the city. Areas of the city that pose high risks due to fuel loading and topography are in the hills west of Interstate 680 (I-680) and in the hills to the south of most developed areas of the city.

Fire Protection and Emergency Medical Services

Northern California

CAL FIRE is responsible for fire protection and stewardship of over 31 million acres of California's privately owned wildlands. CAL FIRE also provides varying levels of emergency services in 36 of California's 58 counties via contracts with local governments. Because of the Department's size and major incident management experience, it is often asked to assist or take the lead in disasters.⁷ In October 2017, a series of wildfires occurred in Northern California resulting in extensive property damage. In November 2018, the Camp Fire wildfire occurred in Northern California, resulting in the deadliest wildfire to occur in State history.⁸ In September and October 2020, the Glass Fire burned over 67,484 acres and destroyed 1,555 structures, including 308 homes and 343 commercial buildings in Napa County and 334 homes in Sonoma County.⁹

City of Pleasanton

The Livermore-Pleasanton Fire Department (LFPD) is jointly operated by the cities of Livermore and Pleasanton and firefighters and paramedics are dispatched to a variety of incidents, including structure fires, hazardous materials, medical calls, and traffic accidents. The LFPD has a daily staffing level of 36 personnel, which occupy 10 fire stations and provide emergency response to the cities of Livermore and Pleasanton.¹⁰

Pleasanton has five fire stations and a daily staffing level of 18 personnel. There are four Type 1 Engine Companies with a mix of three and four personnel, one Ladder Truck with four personnel, and one Battalion Chief on duty each day. The minimum paramedic staffing each day is five personnel, and each company has at least one assigned paramedic. The remaining personnel are all either Paramedic or Emergency Medical Technician (EMT) qualified.¹¹

These companies all cross staff a host of apparatus from their respective fire stations, which include two Type 3 Engines, three Type 6 Engines, one Hazardous Materials Unit, one rescue boat, one

⁷ California Department of Forestry and Fire Protection (CAL FIRE). 2022. About Us. Website: <https://www.fire.ca.gov/about-us/>. Accessed June 22, 2022.

⁸ California Department of Forestry and Fire Protection (CAL FIRE). 2021. Top 20 Deadliest California Wildfires. Website: https://www.fire.ca.gov/media/lbfd0m2f/top20_deadliest.pdf. Accessed June 22, 2022.

⁹ California Department of Forestry and Fire Protection (CAL FIRE). 2020. Glass Fire. Website: <https://www.fire.ca.gov/incidents/2020/9/27/glass-fire/>. Accessed June 22, 2022.

¹⁰ Solak, Jason. Deputy Fire Chief: Operations. Livermore-Pleasanton Fire Department. Personal communication: email. April 22, 2022.

¹¹ Ibid.

Utility Terrain Vehicle (UTV) Special Response Vehicle, and one State Office of Emergency Services (OES) Type I Engine.

Emergency and Evacuation Routes/Access

City of Pleasanton

The Comprehensive Emergency Management Plan outlines general procedures in response to emergency crises, such as evacuations. In terms of evacuation, the main roads into and out of the vicinity of the potential sites for housing would be I-680 in the north–south direction and I-580 in the east–west direction. These roads would act as the main evacuation routes into and out of the city.

Post-fire Slope Instability and Drainage Pattern Changes

City of Pleasanton

The storm drainage system is composed of curb inlets, pipes, and natural swales that carry runoff to flood control channels known as arroyos. Drainage features would be evaluated on a site-by-site basis as the potential sites for rezoned are developed in the future.

3.16.3 - Regulatory Framework

Federal

United States Department of Interior

Review and Update of the 1995 Federal Wildland Fire Management Policy

1. **Safety**—Firefighter and public safety is the first priority. All Fire Management Plans and activities must reflect this commitment
2. **Fire Management and Ecosystem Sustainability**—The full range of fire management activities will be used to help achieve ecosystem sustainability, including its interrelated ecological, economic, and social components
3. **Response to Wildland Fire**—Fire, as a critical natural process, will be integrated into land and resource management plans and activities on a landscape scale, and across agency boundaries. Response to wildland fire is based on ecological, social, and legal consequences of the fire. The circumstances under which a fire occurs, and the likely consequences on firefighter and public safety and welfare, natural and cultural resources, and values to be protected dictate the appropriate management response to the fire.
4. **Use of Wildland Fire**—Wildland fire will be used to protect, maintain, and enhance resources and, as nearly as possible, be allowed to function in its natural ecological role. Use of fire will be based on approved Fire Management Plans and will follow specific prescriptions contained in operational plans.
5. **Rehabilitation and Restoration**—Rehabilitation and restoration efforts will be undertaken to protect and sustain ecosystems, public health, and safety, and to help communities protect infrastructure.
6. **Protection Priorities**—The protection of human life is the single, overriding priority. Setting priorities among protecting human communities and community infrastructure, other

property and improvements, and natural and cultural resources will be based on the values to be protected, human health and safety, and the costs of protection. Once people have been committed to an incident, these human resources become the highest value to be protected.

7. **Wildland Urban Interface**—The operational roles of federal agencies as partners in the Wildland Urban Interface are wildland firefighting, hazardous fuels reduction, cooperative prevention and education, and technical assistance. Structural fire suppression is the responsibility of Tribal, State, or local governments. Federal agencies may assist with exterior structural protection activities under formal Fire Protection Agreements that specify the mutual responsibilities of the partners, including funding. (Some federal agencies have full structural protection authority for their facilities on lands they administer and may also enter into formal agreements to assist State and local governments with full structural protection.)
8. **Planning**—Every area with burnable vegetation must have an approved Fire Management Plan. Fire Management Plans are strategic plans that define a program to manage wildland and prescribed fires based on the area’s approved land management plan. Fire Management Plans must provide for firefighter and public safety; include fire management strategies, tactics, and alternatives; address values to be protected and public health issues; and be consistent with resource management objectives, activities of the area, and environmental laws and regulations.
9. **Science**—Fire Management Plans and programs will be based on a foundation of sound science. Research will support ongoing efforts to increase our scientific knowledge of biological, physical, and sociological factors. Information needed to support fire management will be developed through an integrated interagency fire science program. Scientific results must be made available to managers in a timely manner and must be used in the development of land management plans, Fire Management Plans, and implementation plans.
10. **Preparedness**—Agencies will ensure their capability to provide safe, cost-effective fire management programs in support of land and resource management plans through appropriate planning, staffing, training, equipment, and management oversight.
11. **Suppression**—Fires are suppressed at minimum cost, considering firefighter and public safety, benefits, and values to be protected, consistent with resource objectives.
12. **Prevention**—Agencies will work together and with their partners and other affected groups and individuals to prevent unauthorized ignition of wildland fires.
13. **Standardization**—Agencies will use compatible planning processes, funding mechanisms, training and qualification requirements, operational procedures, values to be protected methodologies, and public education programs for all fire management activities.
14. **Interagency Cooperation and Coordination**—Fire management planning, preparedness, prevention, suppression, fire use, restoration and rehabilitation, monitoring, research, and education will be conducted on an interagency basis with the involvement of cooperators and partners.

15. **Communication and Education**—Agencies will enhance knowledge and understanding of wildland fire management policies and practices through internal and external communication and education programs. These programs will be continuously improved through the timely and effective exchange of information among all affected agencies and organizations.
16. **Agency Administrator and Employee Roles**—Agency administrators will ensure that their employees are trained, certified, and made available to participate in the wildland fire program locally, regionally, and nationally as the situation demands. Employees with operational, administrative, or other skills will support the wildland fire program as necessary. Agency administrators are responsible and will be held accountable for making employees available.
17. **Evaluation**—Agencies will develop and implement a systematic method of evaluation to determine effectiveness of projects through implementation of the 2001 Federal Fire Policy. The evaluation will assure accountability, facilitate resolution of areas of conflict, and identify resource shortages and agency priorities.

State

California Emergency Response Plan

California has developed an emergency response plan to coordinate emergency services provided by federal, State, and local governments and private agencies. Responding to hazardous materials incidents is one part of this plan. The plan is administered by the California Governor’s Office of Emergency Services (Cal/OES), which coordinates the responses of other agencies. The Alameda County Sheriff’s OES Division coordinates response to emergencies in unincorporated areas of Alameda County. Emergency response team members respond and work with local fire and police agencies, emergency medical providers, the California Highway Patrol (CHP), CAL FIRE, the California Department of Fish and Wildlife (CDFW), and California Department of Transportation (Caltrans).

California Department of Forestry and Fire Protection Threat Potential Mapping

CAL FIRE has mapped fire threat potential throughout California. CAL FIRE maps fire threat based on the availability of fuel and the likelihood of an area burning (based on topography, fire history, and climate). The threat levels include no fire threat, moderate, high, and very high fire threat. Further, the maps designate the majority of the city as the LRA (Exhibit 3.8-3 in Section 3.8, Hazards and Hazardous Materials). However, small parts of the eastern and southern portions of the city are within an SRA. Additionally, CAL FIRE produced a 2010 Strategic Fire Plan for California, which contains goals, objectives, and policies to prepare for and mitigate the effects of fire on California’s natural and built environments. The CAL FIRE Office of the State Fire Marshal provides oversight of enforcement of the California Fire Code as well as overseeing hazardous liquid pipeline safety.

California Building Code

The State of California provided a minimum standard for building design through the 2019 California Building Standards Code (CBC), which is in Part 2 of Title 24 of the California Code of Regulations. The 2019 CBC is based on the 2018 International Building Code but has been modified for California conditions. It is generally adopted on a jurisdiction by-jurisdiction basis, subject to further

modification based on local conditions. Commercial and residential buildings are plan-checked by local city and county building officials for compliance with the CBC. Typical fire safety requirements of the CBC include the installation of sprinklers in all new high-rise buildings and residential buildings; the establishment of fire resistance standards for fire doors, building material; and particular types of construction. The 2022 CBC (California Code of Regulations [CCR], Title 24) has an effective date of January 1, 2023.

California Public Resources Code

The California Public Resources Code includes fire safety regulations that restrict the use of equipment that may produce a spark, flame, or fire; require the use of spark arrestors¹² on construction equipment that use an internal combustion engine; specify requirements for the safe use of gasoline-powered tools in fire hazard areas; and specify fire suppression equipment that must be provided on-site for various types of work in fire-prone areas.

These regulations include the following:

- Earthmoving and portable equipment with internal combustion engines would be equipped with a spark arrestor to reduce the potential for igniting a wildland fire (Public Resources Code [PRC] § 4442);
- Appropriate fire suppression equipment would be maintained during the highest fire danger period—from April 1 to December 1 (PRC § 4428);
- On days when a burning permit is required, flammable materials would be removed to a distance of 10 feet from any equipment that could produce a spark, fire, or flame, and the construction contractor would maintain the appropriate fire suppression equipment (PRC § 4427); and
- On days when a burning permit is required, portable tools powered by gasoline-fueled internal combustion engines would not be used within 25 feet of any flammable materials (PRC § 4431).

Assembly Bill 747

Adopted in 2019, Assembly Bill (AB) 747 requires safety elements to be reviewed and updated as necessary to identify evacuation routes and their capacity, safety, and viability under a range of emergency scenarios. The law authorizes a city or county that has adopted a LHMP, emergency operations plan, or other document that fulfills commensurate goals and objectives to use that information in the safety element to comply with this requirement by summarizing and incorporating by reference that other plan or document in the safety element. If a local jurisdiction has not adopted a LHMP, the safety element must be reviewed and updated as necessary to identify evacuation routes and their capacity, safety, and viability under a range of emergency scenarios. If a LHMP, emergency operations plan, or other document fulfills commensurate goals and objectives, a local agency may use that information in the safety element to comply with this requirement by summarizing and incorporating by reference such a plan or other document into the safety element.

¹² A spark arrestor is any device that prevents the emission of flammable debris from a combustion source (i.e., fireplaces, internal combustion engines, and wood burning stoves).

Senate Bill 99

Adopted in 2019, Senate Bill (SB) 99 requires a city or county, upon the next revision of the housing element on or after January 1, 2020, to review and update the safety element to include information identifying residential developments in hazard areas that do not have at least two emergency evacuation routes (i.e., points of ingress and egress).

Regional

Tri-Valley Local Hazard Mitigation Plan

In 2018, the City of Pleasanton, the cities of Livermore and Dublin, the LPPD, Dublin San Ramon Services District, and the Lawrence Livermore National Laboratory updated and adopted the Tri-Valley LHMP. The Tri-Valley LHMP administers a uniform hazard mitigation strategy for the Tri-Valley Area and addresses several hazards including, but not limited to, wildland fire, floods, and earthquakes. The Tri-Valley LHMP includes nine area-wide mitigation actions and 11 Pleasanton-specific mitigation actions including emergency response and evaluation plans, public outreach, building safety and retrofitting, emergency preparedness coordination, education, facility upgrades, and monitoring actions. The LHMP contains the following goals aimed at reducing the vulnerability from natural hazards:

- Ensure that hazards are identified and considered in land use decisions.
- Improve local emergency management capability.
- Promote community awareness, understanding, and interest in hazard mitigation policies and programs.
- Incorporate hazard mitigation as an integrated public policy and standard practice.
- Reduce community exposure and vulnerability to hazards where the greatest risk exists.
- Increase resilience of infrastructure and critical facilities.
- Promote an adaptive and resilient planning area that responds proactively to future conditions.
- Develop and implement mitigation strategies that identify the best alternative to protect natural resources, promote equity, and use public funds in an efficient and cost-effective manner.

Livermore-Pleasanton Fire Department Vegetation Management Standards

Defensible Space

In addition to General Weed Abatement, the following areas shall be maintained as defensible space:

- Within 20 feet of end of pavement of roads/sidewalks, and
- Within 100 feet of any structure (structures on the subject property or on neighboring properties), and
- 10 feet on either side of formal foot trails;
- 10 feet on either side of a combustible fence

General: 0-100 feet from structures

- Cut or mow annual grass down to a maximum height of four inches. An increase is allowed when required control erosion on steep slopes – contact the Fire Department for details
- Spacing
 - Create horizontal space between shrubs and trees (see LPPD Vegetation Management Standards)
 - Create vertical space between grass, shrubs, and trees (see LPPD Vegetation Management Standards)
 - Alternative for areas 30 feet or more from structures: use Continuous Canopy Option (see LPPD Vegetation Management Standards)
- Remove fallen leaves, needles, twigs, bark, cones, and small branches. However, they may be permitted to a depth of four inches
- Remove dead and dying trees, bushes, and brush

Structures: 0–30 feet from structures

- Remove all dead plants, grasses, and weeds
- Remove dead or dry leaves and pine needles on the ground
- Remove/trim branches that overhang the roof or come within 10 feet of a chimney (see LPPD Vegetation Management Standards)
- Ensure wood piles are at least 30 feet from structures

Local

City of Pleasanton

Comprehensive Emergency Management Plan

The Comprehensive Emergency Management Plan addresses the response to emergency incidents associated with emergencies within the city. This Comprehensive Emergency Management Plan is based on the functions and principles of the California Standardized Emergency Management System, the National Incident Management System, and the Incident Command System.

City of Pleasanton General Plan

The General Plan, adopted in 2009 and last amended in August 2019, contains the following relevant policies and actions that assist in reducing or avoiding impacts related to wildfire:

Public Safety Element

The Public Safety Element, Chapter 5 of the General Plan, discusses hazardous wastes and materials in the context of operations within the city. Its purpose is to provide information, policies, and programs with the intent of reducing the potential for human injury and loss of life and to minimize property damage and economic and social disruption due to natural and man-made hazards. Projects must be generally consistent with the relevant guidelines outlined in the General Plan.

The General Plan identifies Special Fire Protection Areas within the city, which are Wildland Urban Interface fire threat areas. According to Figure 5-6 of the General Plan, Sites 1 (Lester), 22 (Merritt), and 27 (PUSD-Vineyard) are located in Special Fire Protection Areas. Some of the policies described below apply specifically to Special Fire Protect Areas.¹³

The Public Safety Element sets forth the following goals, objectives, policies, and actions associated with wildfire:

- Goal 1** Minimize the risks to lives and property, and minimize the potential for liability to the City due to seismic activity within the Planning Area.
- Policy 2** Investigate the potential for seismic hazards during the development review process and implement soils engineering and construction standards which minimize potential danger from earthquakes.
- Program 2.2** Design and construct all structures to address potential seismic and geologic hazard conditions according to the California Uniform Building Code (CBC) standards or more stringent standards. All structures and facilities not addressed by the CBC shall be designed and constructed to mitigate potential seismic and geologic hazards as recommended by site-specific soils, geologic, and/or geotechnical engineering studies.
- Goal 2** Minimize the risks to lives and property, and to minimize potential liability to the City, due to geologic hazards within the Planning Area.
- Policy 5** Investigate the potential for geologic hazards as part of the development review process and maintain this information for the public record.
- Program 5.1** Require site-specific soils studies for all new development prior to the issuance of building permits and prior to the approval of final improvement plans. Where there is risk of geologic hazards, the soil study should address seismic shaking, lateral spreading, differential settlement, lurch cracking, liquefaction, erosion, and expansive soils.
- Program 5.2** Require site-specific geologic and/or geotechnical engineering studies prior to development approval where there is risk of the following geologic hazards: surface fault rupture, bank failures, rock falls, landslides, and for areas with slopes equal to or greater than 20 percent.
- Policy 6** Restrict new development of sites with structures intended for human occupancy in any landslide prone or unstable area.
- Program 6.1** Prohibit new development of sites with structures intended for human occupancy in any landslide prone areas unless the landslide risk can be eliminated. Permit

¹³ City of Pleasanton. 2009. General Plan, Public Safety Element, Figure 5-6. Accessed June 13, 2022.

development in landslide prone areas only when sites can be shown to be stable during adverse conditions such as saturated soils, ground shaking, and during grading of the site for roads, installation of infrastructure, and creation of building pads. Engineering studies shall demonstrate that structures in landslide prone areas would sustain no more damage due to slope instabilities than damage sustained by a similar building in the Pleasanton Planning Area constructed to current CBC standards and located on soils with a low susceptibility to failure when exposed to moderate ground shaking.

Program 6.2 Require developers to include drainage, erosion, and landslide mitigation measures to reduce landslide potential.

Program 6.3 Design irrigation systems to minimize the potential for soil saturation, excessive runoff, and other factors deemed to contribute to slope instability.

Program 6.4 Design grading plans to minimize earth moving activity and site grading in areas of potential land instability and in areas identified as having “Mostly landslides,” as shown on Figure 5-1 of the General Plan.

Program 6.5 Establish Geologic Hazard Abatement Districts (GHADs) in areas of new development where landslide risks or other geologic hazards are known to exist, to assure that ongoing monitoring and maintenance of slopes and drainage facilities occurs. GHADs should be considered for hillside development such as west of Foothill Road and other areas prone to seismic, landslide, and other geologic hazards.

Program 6.6 In unstable areas, prohibit major grading where existing slopes are 25 percent or greater.

Goal 3 Minimize the risks to lives, property, and the environment due to fire hazards within the Planning Area and provide the highest quality of emergency response service feasible.

Policy 8 Provide an adequate level of fire and emergency medical equipment and personnel to protect the community.

Program 8.1 Incorporate Fire Department expansion needs into each year’s Capital Improvement Program and Operating Budget.

Program 8.2 Require new development to pay for fire safety improvement needs generated by the new development

Program 8.4 Invest in equipment that assists emergency responders in accurately and quickly reaching the scene of an emergency.

Policy 12 Upgrade the level of fire resistivity in all new and remodeled structures.

- Program 12.1** Continuously update and enforce the City’s Fire and Building Codes as new technologies occur.
- Policy 13** Require fire mitigation measures in new and existing developments that reduce the fire threat to the structure and occupants. Require development outside the five-minute travel time and in Special Fire Protection Areas to provide effective fire prevention measures.
- Program 13.1** Require the installation of building and fire code compliant fire-detection and alarm equipment in residential and commercial structures.
- Program 13.2** Require the installation of building and fire code compliant fire-detection and alarm equipment in residential and commercial structures.
- Program 13.3** Encourage the installation of automatic fire sprinkler systems in all new construction.
- Program 13.4** Provide adequate fire equipment access to all structures in the City.
- Program 13.5** Partner with the California Department of Forestry and Fire Prevention and Firewise Communities to identify measures that reduce the fire threat in Special Fire Protection Areas.
- Program 13.6** Where appropriate in Special Fire Protection Areas, require development to incorporate wildland interface mitigation measures such as greenbelts, defensible space around structure, and other preventive measures.
- Program 13.7** Require all projects in the Special Fire Protection Areas seeking building or planning approval to landscape with fire resistant plant materials.
- Goal 7** Protect the public in the event of a natural or human-caused disaster.
- Policy 22** Provide an adequate level of supplies at all critical facilities.
- Policy 23** In partnership with the Pleasanton Unified School District, prepare and keep current City emergency procedures in the event of potential natural or human-caused disaster.
- Policy 24** Promote public safety through public education programs.
- Policy 25** Partner with the business and non-profit communities for emergency preparedness to ensure continuity of business and service operations and the safety of employees immediately following an emergency.

Conservation and Open Space Element

The Conservation and Open Space Element, Chapter 7 of the General Plan, provides goals, policies, and programs to conserve and manage natural resource and open space areas for the preservation,

production, and enjoyment of natural and cultural resources and for the promotion of open space recreation, protection of public health and safety, and preservation of valuable wildlands.

Policy 1 Preserve and enhance natural wildlife habitats and wildlife corridors.

Program 1.12 Support appropriate development intensity adjacent to areas designated as Wildland Overlay.

Policy 6 Protect all large continuous areas of open space, as designated on the General Plan Map, from intrusion by urban development.

Program 6.2 Establish appropriate levels for the development of land adjacent to areas designated as Wildland Overlay through studies which indicate the types of development posing the least potential negative impact on wildlife habitat.

Program 6.7 Continue to restrict private development in areas designated as Public Health and Safety and Wildland Overlay to a single-family home on existing lots of record as of September 16, 1986.

Wildland Overlay

Lands adjacent to the Arroyo Mocho, Arroyo de la Laguna, Arroyo del Valle, and Alamo Canal waterways are designated as Wildland Overlay by the General Plan. Wildland Overlay areas contain valuable wildlife habitats and communities and can function as corridors for wildlife movement between major open space areas including regional parks, wilderness areas, and watershed lands. The purpose of the Wildland Overlay is to retain the habitat and biological diversity that might otherwise be lost. To ensure long-term preservation of the city's biological diversity, a variety of habitat types need protection in areas large enough to include viable populations of species which may be present in low numbers. Therefore, wildlands include canyons, ridgetops, grasslands, woodlands, brushlands, riparian corridors, wetlands, arroyos, and streams.

Vineyard Avenue Corridor Specific Plan

The Vineyard Avenue Corridor Specific Plan includes the 384-acre area along Vineyard Avenue in southeast Pleasanton. The Vineyard Avenue Corridor Specific Plan establishes a unique environment which includes a variety of agricultural, residential, open space, recreational, educational, and other uses. Objectives, policies, and guidelines regarding wildfire in the Vineyard Avenue Corridor Specific Plan include:

Development Standards and Design Guidelines

Fire Safety Requirements

- Ornamental landscaping shall emphasize the use of fire resistant species
- All residences located on slopes greater than 15 percent shall be accessible from driveways designed to accommodate firefighting equipment. Driveways shall be a minimum of 16 feet wide and 20 feet clear. Driveways exceeding 150 feet in length shall be designed to allow a fire truck to turn around.

- New homes located adjacent to Open Space land shall be protected through the use of fire breaks, removal of any vegetation and other material presenting potential fire hazards, and the use of fire-retardant vegetation.

Open Space District

- Open Space Development Standards
 - Proper management of Open Space areas is necessary to maintain the quality of the existing natural environmental as well as to reduce fire hazards. A site-specific Open Space Management Plan shall be prepared and submitted by each developer of lots which contain Open Space land as a part of the PUD development plan application. Plans shall address agricultural operations, open space maintenance, and wildlife and vegetation preservation needs.
 - A site-specific Wildland Fire Protection Plan shall be prepared and submitted by each developer of lots which contain Open Space land in accordance with Pleasanton Municipal Code, Title 20, Section 20.08.045 and 20.08.048.
 - Emergency vehicle access shall be provided to any Open Space area required by the Livermore-Pleasanton Fire Department in a manner specified by the Department to ensure an adequate level of fire safety.

Public Health and Safety Requirements Relating to Construction

- Evacuation plans shall be prepared for the elementary school and possible bed-and-breakfast inns and other commercial uses located within the Del Valle Dam Flood Inundation Area for the unlikely event of a failure to the Del Valle Dam.

Circulation Objectives

- Ensure adequate access for emergency vehicle service to all new homes.

City of Pleasanton Climate Action Plan 2.0

The City's Climate Action Plan (CAP 2.0) was built upon the success of the previous plan. It develops a new suite of actions to reduce greenhouse gas emissions, mitigate the acceleration of climate change, and improve community resilience. The CAP 2.0 targets three sectors relevant to utilities: Buildings and Energy, Materials and Consumption, and Water Resources. The CAP 2.0 delineates several goals and frameworks to achieve said goals within these sectors, including maintaining zero-emissions energy through EBCE, SB 1383 implementation, textile recovery, the Water Conservation Program, on-site stormwater management, and more. The CAP 2.0 was adopted in March 2022. Relevant strategies are provided below:

Community Resilience in Pleasanton: Pleasanton is expected to face more extreme weather such as flooding and heat waves, increased water uncertainty, and increased risk from wildfire, especially smoke. These vulnerabilities will stress public infrastructure, water provision, natural systems, and public health.

Strategy CRW-1 Improve community resilience and reduce vulnerability to climate change:

Climate change is global, but it is felt at the local level. In Pleasanton, we have experienced poor air quality due to wildfires, mandatory water usage cuts due to droughts, and increased temperatures. Access to programming that supports, educates, and improves the quality of life for the most vulnerable communities is essential to improve resilience and prepare communities for climate impacts. Existing programs encourage active lifestyle and green space, which enhance public health. To continue to support healthy communities, the City of Pleasanton will maintain current community resilience programs and dedicate resources to comprehensive climate awareness, education, and outreach, both of which are critical to understanding how to prepare for climate change and the consequences of inaction.

Pleasanton Municipal Code

The Municipal Code includes several regulations pertaining to wildfire, which are summarized below.

Fire Safety Ordinances

The Pleasanton Municipal Code contains three sections that bear directly on fire safety. The Building Code, Chapter 20.08, provides minimum standards for design, construction, materials, occupancy, location, and maintenance of all buildings within the city. The Fire Code, Chapter 20.24, regulates how a building is used, how machines and equipment are maintained, how hazardous materials are handled and stored, and how access to and from a site is provided. The Fire Code, Chapter 20.24.160, includes a requirement for automatic fire extinguishing systems in all new buildings and structures, as well as some modifications that add floor area or change occupancy. The Subdivision Ordinance, Chapter 19.36, establishes standards for roadway dimensions, subdivision layout, and public improvements needed to protect public safety. In addition, all new developments are reviewed by City departments for their potential effects on public safety, and conditions of approval are attached to minimize such effects and inspections are conducted to ensure proper installation. Developments located outside the 5-minute response time areas are required to provide additional fire mitigation measures, which include, at a minimum, automatic fire sprinkler systems.

3.16.4 - Project Impacts and Mitigation Measures

Significance Criteria

The City is using Appendix G of the California Environmental Quality Act (CEQA) Guidelines as thresholds of significance for Housing Element Update. To determine whether wildfire impacts would be considered significant from implementation of the Housing Element Update, the following questions are analyzed and evaluated. If located in or near SRAs or lands classified as VHFHSZ, would the Housing Element Update:

- a) Substantially impair an adopted emergency response plan or emergency evacuation plan?

- b) Due to slope, prevailing winds, and other factors, exacerbate wildfire risks, and thereby expose project occupants to, pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire?
- c) Require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment?
- d) Expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes?

Approach to Analysis

This evaluation focuses on whether the Housing Element Update would result in changes to the physical environment that would cause or exacerbate adverse effects related to wildfires or whether the potential sites for rezoning would be placed in a location susceptible to wildfire or post-wildfire conditions. Although the Dublin-Pleasanton BART station property is not included as a potential site for rezoning and was analyzed in the Supplemental Environmental Impact Report for the City of Pleasanton Housing Element and Climate Action Plan General Plan Amendment and Rezoning (State Clearinghouse No. 2011052002), this section will analyze whether the incremental increase in allowable residential units (306 units) and associated population over that previously analyzed would have any impacts to the physical environment or exacerbate adverse effects related to wildfires. The evaluation also includes a determination of whether changes to the physical environment associated with development consistent with the Housing Element Update would impair or interfere with emergency response plans, expose people to pollutant concentrations from a wildfire or uncontrolled spread of a wildfire, expose people/structures to downslope flooding or landslides, or include installation or maintenance of infrastructure that may exacerbate fire risk. The following analysis is based, in part, on information provided by the General Plan, the City's Comprehensive Emergency Management Plan, and CAL FIRE. The information obtained from these sources and other relevant materials was reviewed to evaluate the potential presence of wildfire risks on the potential sites for housing.

Impact Evaluation

Emergency Response/Evacuation Plan Consistency

Impact WILD-1: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not substantially impair an adopted emergency response plan or emergency evacuation plan.

As discussed above, portions of the Planning Area and Sites 1 (Lester) and 22 (Merritt) are within an SRA or a VHFHSZ in a local, State, or FRA (Exhibit 3.8-3 in Section 3.8, Hazards and Hazardous Materials). The Dublin-Pleasanton BART station property is not mapped within a FHSZ LRA or SRA. The land just north of the Dublin-Pleasanton BART station property is mapped as a moderate FHSZ FRA. As such, the development consistent with the Housing Element Update could approve, propose, or authorize development in an SRA or VHFHSZ. Therefore, development consistent with

the Housing Element Update could affect adopted emergency response plans or emergency evacuation plans.

Most of the potential sites for housing are within parcels that contain existing homes or businesses that are designed to include and maintain defensible space. During construction, projects would be required to comply with applicable regulations regarding circulation. For example, depending on the location and size of a proposed project, as determined by the City, larger projects could be required to prepare and implement a construction traffic control/traffic management plan to ensure adequate traffic flow and to keep key routes open during construction. In addition, individual projects would be required to pay all applicable local and regional transportation impact fees to fund the construction of planned roadway improvements in the area as determined at the time of application. As most of the development consistent with the Housing Element Update would occur as redevelopment within the urbanized areas of the city, outside of an SRA, at operation the development consistent with the Housing Element Update would not materially overburden any designated evacuation routes nor substantially impair any emergency response plans or emergency evacuation plans.

Development consistent with the Housing Element Update, including potential development closest within the SRA on Sites 1 (Lester) and 22 (Merritt), would not impair an adopted emergency response plan or emergency evacuation plan during construction or operation because policies and programs contained within the General Plan establish requirements for preventive measures and practices to minimize wildland fire hazards and maintain adequate evacuation and access routes for vehicles in the event of an emergency, including but not limited to, fire service features, access requirements, water supply access and availability, fire and smoke protection features, building materials, construction requirements, and defensible space and vegetation management. Program 8.4 requires the investment in equipment that assists emergency responders in accurately and quickly reaching the scene of an emergency. Policy 13 requires fire mitigation measures in new developments within the Special Fire Protection Areas, and Policy 13.4 requires the provision of adequate fire equipment access to all structures in the city. Policy 23 mandates the preparation of City emergency procedures in the event of a natural or human-caused disaster. Policy 24 promotes public safety through public education programs, and Policy 25 requires the City to partner with business and non-profit communities for emergency preparedness. With respect to Site 27 (PUSD-Vineyard), the Vineyard Avenue Corridor Specific Plan requires adequate access for emergency vehicle services to all new homes, which would be confirmed during project approval.

As discussed in Section 3.8, Hazards and Hazardous Materials, the Comprehensive Emergency Management Plan outlines general procedures in response to emergency crises, such as evacuations. The Comprehensive Emergency Management Plan establishes an emergency organization to direct and control operations during a period of emergency by assigning responsibilities to specific personnel, which would not be altered by development consistent with the Housing Element Update.

The main roads into and out of the vicinity of the potential sites for housing would be I-680 in the north–south direction and I-580 in the east–west direction. These roads would act as the main evacuation routes into and out of the city. With adherence to the procedures of the Comprehensive

Emergency Management Plan, development consistent with the Housing Element Update would not conflict with an adopted emergency response plan.

Additionally, all development in the city would be required to demonstrate compliance with applicable codes and regulations. Development consistent with the Housing Element Update would require continued implementation of the Tri-Valley LHMP and the Comprehensive Emergency Management Plan. Further, the California Fire Code establishes requirements for emergency access for fire apparatus. Examples include requirements for multiple points for access for certain types of development, minimum street widths, and maximum acceptable grades for new roads. Chapter 19.36 of the Municipal Code establishes standards for roadway dimensions, subdivision layout, and public improvements required to protect public safety, including emergency response and evacuation. Chapter 20.24 of the Municipal Code regulates how access is taken to and from a site. Ongoing compliance with safety measures, such as weed abatement and defensible space requirements, are enforceable through the City's code enforcement. As such, new development projects consistent with the Housing Element Update would be assessed for compliance with applicable Fire Code requirements that pertain to emergency access as well as compliance with policies and programs of the General Plan which would further enhance emergency response. LFPD reviews architectural and development plans to ensure that new development projects meet fire protection and emergency access requirements in accordance with Chapter 20.24.010 of the Municipal Code, which implements the California Fire Code on a local level. By involving LFPD in the development review process, the City ensures adequate emergency vehicle access and ensures that development is designed and operated in a manner that minimizes fire hazards and maximizes the potential for responsive emergency services.

Accordingly, compliance with the CBC and General Plan programs and policies, as well as review of all new structures by the Police and Fire Departments to ensure adequate emergency access, would ensure that impacts are less than significant.

Level of Significance

Less than significant impact.

Expose Project Occupants to Pollutant Concentrations from Wildfire

Impact WILD-2: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not, due to slope, prevailing winds, and other factors, exacerbate wildfire risks, and thereby expose project occupants to pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire.

New development in areas identified as VHFHSZ could expose people or structures to wildfire spread. As discussed above, most of the Planning Area is not located in a VHFHSZ LRA or SRA (Exhibit 3.8-3 in Section 3.8, Hazards and Hazardous Materials). Therefore, for many of the potential sites for housing, the degree of wildfire hazard, including the exposure of future occupants to pollutant concentrations from a wildfire or the uncontrolled spread of wildfire due to slope or prevailing winds, would not substantially increase with adoption of the Housing Element Update, and current hazards would not significantly increase.

Small portions of Site 2 (Stoneridge Shopping Center, Mall), most of Site 26 (St. Augustine), and the land north of Site 21a and b (Kiewit) are within a moderate fire hazard zone LRA. Small portions of Site 2 (Stoneridge Shopping Center, Mall), Site 23 (Sunol Boulevard), and Site 27 (PUSD-Vineyard) are within a high fire hazard zone LRA. The entirety of Site 1 (Lester) is within a high FHSZ SRA and the southern portion of Site 22 (Merritt) the portion not mapped as a VHFHSZ LRA) is within a moderate FHSZ, with the easternmost portion of the site mapped as a VHFHSZ SRA. If a fire were to occur in the more flat and urbanized areas of the city, the risk of the fire spreading rapidly would be less than in areas with steeper slopes. Of the sites located in moderate or high FHSZ, Sites 1 (Lester) and 22 (Merritt) are the only potential sites for housing are adjacent to slopes. Additionally, Sites 1 (Lester), 22 (Merritt), and 27 (PUSD-Vineyard) are in Special Fire Protection Areas as designated by the General Plan.

Nevertheless, all future development consistent the Housing Element Update would be conditioned to require compliance with the City, County, and the LFPD plans, policies, actions, and ordinances in place to reduce the risks associated with wildfires. All new development would be required to comply with the Public Safety Element of the General Plan Policy 8, which requires that an adequate level of fire equipment and personal to be provided to the community, Policy 12, which requires that all new development to upgrade the level of fire resistivity, and Policy 13, which requires fire mitigation measures in new and existing developments that reduce the fire threat to the structure and occupants. Additionally, Policy 13 also requires development outside the five-minute travel time and in Special Fire Protection Areas to provide effective fire prevention measures. As discussed above, Policy 23, which mandates the preparation of City emergency procedures in the event of a natural or human-caused disaster, would also apply to new development. With respect to Site 27 (PUSD-Vineyard), the Vineyard Avenue Corridor Specific Plan provides development standards and design guidelines, including siting of development and use of fire breaks, vegetation, and open space management, that would reduce fire threat to structures and occupants.

Additionally, the LFPD reviews architectural and development plans to ensure that new development projects meet fire protection and emergency access requirements in accordance with Chapter 20.24 of the Municipal Code, which implements the California Fire Code on a local level. For example, buildings and structures located in or adjacent to fire hazard areas shall maintain the required hazardous vegetation and fuel management as well as defensible space as outlined in Government Code Sections 51175-51189 and local standards. In addition, the LFPD will review plans to ensure that fire sprinklers are installed as required by Municipal Code Section 20.24.160, fire alarms, and fire extinguishers are up to current code and appropriately located within proposed buildings or structures.

As the City receives development applications for subsequent development consistent with the Housing Element Update, those applications would be reviewed by the City and for compliance with the policies and programs of the General Plan to reduce the exposure of people or structures, either directly or indirectly, to a risk of loss, injury, or death involving wildfires. In addition, the Municipal Code, which implements the General Plan, would be reviewed when development applications are received, including Chapter 20.08, Pleasanton Building Code (which adopts the California Building Code), Chapter 20.10, Pleasanton Residential Code (which adopts the California Residential Code),

Chapter 20.32, Dangerous Building Code, and Chapter 20.24, Fire Code (which adopted the California Fire Code).

Further, the Tri-Valley LHMP, described above in the Regulatory Framework section, provides recommendations that have been identified for the Tri-Valley Area, which would assist in reducing wildfire risk for development consistent with the Housing Element Update.

The existing plans, policies, actions, and ordinances described above and in WILD-1 would reduce the potential for exposure to wildland fires through preventive and proactive measures to reduce fuel load, maintain robust communications, protect access to evacuation routes, and ensure that new development projects meet fire protection and emergency access requirements. Reducing potential for fires to start and mitigating wildfire spread once started reduces exposure to smoke and air pollution. Safely evacuating people affected by wildfires also reduces exposure.

In conclusion, development consistent with the Housing Element Update is generally focused in already developed areas of the city not within FHSZ. Future projects would be required to comply with fire protection measures as codified within the policies and programs within the General Plan and the Municipal Code. Further, continued implementation of the Tri-Valley LHMP and review of architectural and development plans by the LFPD would assist in protecting life and property in the event of a wildfire. The degree of wildland fire hazard would not substantially change with adoption of the Housing Element Update, and current hazards would not be significantly increased. Therefore, impacts under this topic would be less than significant.

Level of Significance

Less than significant impact.

Infrastructure That Exacerbates Fire Risk

Impact WILD-3: Development consistent with the Housing Element Update, rezonings, and Specific Plan Amendments would not require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment.

New development in the areas identified as VHFHSZ could expose people or structures to wildfire spread. As discussed above, most of the Planning Area is not located in a VHFHSZ LRA or SRA (Exhibit 3.8-3 in Section 3.8, Hazards and Hazardous Materials). Small portions of Site 2 (Stoneridge Shopping Center, Mall), most of Site 26 (St. Augustine), and the land north of Site 21a and b (Kiewit) are within a moderate fire hazard zone LRA. Small portions of Site 2 (Stoneridge Shopping Center, Mall), Site 23 (Sunol Boulevard), and Site 27 (PUSD-Vineyard) are within a high fire hazard zone LRA. The entirety of Site 1 (Lester) is within a high FHSZ SRA and the southern portion of Site 22 (Merritt, the portion not mapped as a VHFHSZ LRA) is within a moderate FHSZ with the easternmost portion of the site mapped as a VHFHSZ SRA. Additionally, Sites 1 (Lester), 22 (Merritt), and 27 (PUSD-Vineyard) are in Special Fire Protection Areas as designated by the General Plan.

As described in Chapter 2, Project Description, all the potential sites for housing, aside from Sites 1 (Lester) and 22 (Merritt) are located within the incorporated area. Site 22 (Merritt) is just outside of city limits but within Pleasanton's Sphere of Influence (SOI) and Urban Growth Boundary (UGB). Site 1 (Lester) is also located just outside of city limits; however, the western half of Site 1 (Lester) is located just outside the UGB. Most of the potential sites for housing are already developed or partially developed with urbanized uses, or are relatively small sites, completely surrounded by urbanized uses. However, Sites 1 (Lester), 3 (PUSD-Donlon), 14 (St. Elizabeth Seton), 21a and b (Kiewit), 22 (Merritt), 26 (St. Augustine), 27 (PUSD-Vineyard), 29 (Oracle) and portions of Site 24 (Sonoma Drive) are vacant. Thus, the majority of development consistent with the Housing Element Update would occur in urban and developed areas that contain existing roadways, fuel breaks, water sources, power lines, and other utilities. The proper installation and maintenance of fire access roadways, the proper siting of hydrants, adequate emergency water supply, and proper access to structures are essential in enabling effective emergency response and firefighting operations. Accordingly, the LPFD would review the installation and maintenance of fire department access roadways, access walkways to and around buildings, and hydrant quantity and placement as required by the California Fire Code and CBC. As discussed under Impacts WILD-1 and WILD-2, compliance with the CBC and General Plan policies and programs, as well as review of all new structures by the LPFD, would ensure that fire risks are not exacerbated.

Further, most development under consistent with the Housing Element Update is expected to occur in urbanized and developed areas where existing infrastructure (including utilities, highways, and roadways) are already in place. The Housing Element Update would retain the existing roadway patterns. As the City receives development applications for subsequent development consistent the Housing Element Update, those applications would be reviewed by the City for compliance with the fire protection measures identified in the General Plan, the California Fire Code, and the California Public Resources Code to ensure that fire risks are not exacerbated. As such, the Housing Element Update does not propose the installation and maintenance of any new infrastructure that would substantially exacerbate fire risk, and impacts would be less than significant.

Level of Significance

Less than significant impact.

Flooding and Landslide Hazards Due To Post-fire Slope Instability/Drainage Changes

Impact WILD-4: **Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes.**

Slope instability from wildfire scarring of the landscape can result in more intensive flooding and landslides. These post-fire slope soils and altered drainage patterns can more easily creep away downslope sides of foundations and can also reduce lateral support. In a post-fire scenario, wildfires can secondarily cause contamination of reservoirs, as well as transmission line and road destruction. Slopes that have been stripped of vegetation are exposed to greater amounts of erosive runoff, which can weaken soils and cause slope failure. Major landslides can occur several years after a wildfire. Most wildfires burn hot and for long durations and can bake soils, especially those high in

clay content, thus increasing ground imperviousness and runoff generated by storm events thereby increasing the chance of flooding.

New development in the areas identified as VHFHSZ could expose people or structures to wildfire spread. As discussed above, most of the city is not located in a VHFHSZ LRA or SRA. Therefore, the degree of wildland fire hazard, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes, would not substantially change with adoption of the Housing Element Update, and current hazards would not significantly increase.

Small portions of Site 2 (Stoneridge Shopping Center, Mall), most of Site 26 St. Augustine), and the land north of Site 21a and 1b (Kiewit) are within a moderate fire hazard zone LRA. Small portions of Site 2 (Stoneridge Shopping Center, Mall), Site 23 (Sunol Boulevard), and Site 27 (PUSD-Vineyard) are within a high fire hazard zone LRA. The entirety of Site 1 (Lester) is within a high FHSZ SRA and the southern portion of Site 22 (Merritt) the portion not mapped as a VHFHSZ LRA) is within a moderate FHSZ with the easternmost portion of the site mapped as an SRA VHFHSZ. Additionally, Sites 1 (Lester), 22 (Merritt), and 27 (PUSD-Vineyard) are in Special Fire Protection Areas as designated by the General Plan.

As described in Section 3.6, Geology, Soils, and Seismicity, and Section 3.9, Hydrology and Water Quality, all future development on the potential sites for housing would be subject to the rules and regulations of the Municipal Code and the General Plan regarding development on unstable geologic soils and controlling stormwater runoff during and after construction. Specific policies related to the prevention of flooding, landslides, and drainage changes include Program 5.1 and 5.2, which requires site-specific soils study and/or site-specific geologic and/or geotechnical engineering studies would be required for all individual development approval on the potential sites for housing and the recommendations provided by the studies would be incorporated into project design as required by Program 2.2. Policy 6 restricts new development of sites with structures intended for human occupancy in any landslide prone or unstable areas. The applicable programs included in this policy (Programs 6.1, 6.2, 6.3, 6.4, 6.5, and 6.6) prohibit new development of sites with structures intended for human occupancy in any landslide prone areas unless the landslide risk can be eliminated and requires engineering studies to demonstrate that structures in landslide prone areas would sustain no more damage related to slope instabilities than damage sustainable by similar buildings within the city. The programs also require developments to include design features and mitigation to reduce damage associated with seismic-related ground failure and the establishment of Geologic Hazard Abatement Districts (GHADs) to ensure ongoing monitoring and maintenance of slopes and drainage facilities occur. Combined with the review of architectural and development plans by the LPFD, these policies provide additional proactive measures to refine and enhance the resiliency of the city, as well as strengthening the City's review of new applications for development to ensure that potential exposure to secondary wildland fire hazards are not exacerbated. Thus, impacts would be less than significant.

Level of Significance

Less than significant impact.

3.16.5 - Cumulative Impacts

The geographic scope of the cumulative impact analysis for wildfire is the City of Pleasanton as well as the surrounding cities of Livermore, Dublin, and San Ramon and the Town of Danville. This analysis evaluates whether the impacts of the Housing Element Update, together with the impacts of cumulative development, would result in a cumulatively significant impact related to wildfire. This analysis then considers whether incremental contribution to cumulative impacts associated with the implementation of the Housing Element Update would be significant. Both conditions must apply for a project's cumulative effects to rise to a level of significance.

Similar to the City of Pleasanton, the cities of Livermore, Dublin, and San Ramon are largely urbanized, generally outside the SRA and VHFHSZs and include roads and other fuel breaks, emergency water sources, emergency utilities and maintenance of other infrastructure that would reduce impacts from wildfires. However, portions of the cities of Livermore, Dublin, and San Ramon and the Town of Danville are in FRAs and in VHFHSZ SRA and LRAs. All cumulative projects, including the installation and/or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines, or other utilities), would be subject to fire protection development standards and be required to comply with County and City ordinances, General Plan policies, and plan review by the local fire departments to assist in protecting life and property in the event of a wildfire. Additionally, development projects, including the installation and maintenance of associated infrastructure, would be required to comply with all policies in the California Fire Code. Lastly, all cumulative projects, including the installation and maintenance of associated infrastructure, would be covered under existing emergency response plans. For these reasons, cumulative projects would not exacerbate wildfire risk or have any significant cumulative impacts with respect to wildfire hazards. Therefore, cumulative impacts would be less than significant.

The Housing Element Update's incremental contribution to the less than significant cumulative wildfire hazard impacts would not be cumulatively considerable. Development could result in an incremental increase in exposure of people and structures to wildland fires and associated hazards. However, the adoption of the Housing Element Update would not exacerbate any existing wildfire hazards because the degree of wildland fire hazard, including secondary hazards, would not substantially change with adoption of the General Plan Update, and current hazards would not significantly increase, as described above. Additionally, new development on the potential sites for housing would be required to comply with the fire protection measures identified in the General Plan, California Fire Code, and the California Public Resources Code.

Additionally, development consistent with the Housing Element Update would comply with applicable plans, policies, programs, and regulations as described above. Thus, the Housing Element Update's contribution to cumulative impacts would not be cumulatively considerable and would be less than significant.

Level of Cumulative Significance

Less than significant impact.

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3.17 - Agricultural and Forestry Resources

3.17.1 - Introduction

This section describes existing agricultural and forestry resources and potential environmental effects thereon from implementation of the proposed 2023-2031 (6th Cycle) Housing Element Update, rezonings, General Plan and Specific Plan Amendments (collectively referred to herein as the Housing Element Update). Descriptions and analyses in this section are based, in part, on information contained in the City of Pleasanton General Plan (General Plan) and California Department of Conservation Farmland Mapping and Monitoring Program (FMMP) maps. Future projects consistent with the Housing Element Update will be evaluated for project-specific impacts with respect to agricultural and forestry resources at the time they are proposed.

Once the Housing Element Update is adopted, the General Plan would be amended to include the Housing Element Update. Therefore, all references to the General Plan include the Housing Element Update.

3.17.2 - Environmental Setting

Farmland Classifications

The California Department of Conservation FMMP classifies Important Farmland, cultivated agricultural, land into four categories, listed below:

- **Prime Farmland:** Land with the best combination of physical and chemical features able to sustain the long-term production of agricultural crops. These lands have the soil quality, growing season, and moisture supply needed to produce sustained high yields.
- **Unique Farmland:** Land of lesser-quality soils used for the production of the State's leading agricultural crops. This land is usually irrigated but may include non-irrigated orchards or vineyards, as found in some climactic zones in California.
- **Farmland of Statewide Importance:** Land similar to Prime Farmland but with minor shortcomings, such as greater slopes or less ability to hold and store moisture.
- **Farmland of Local Importance:** Land of importance in the local agricultural economy, as determined by each County's Board of Supervisors and a local advisory committee.

Most of the agricultural lands within the city are identified as grazing land by the FMMP. The eastern portion of Site 22 (Merritt) is classified as Unique Farmland by the FMMP (Exhibit 3.17-1). This property has not been recently irrigated or used for crops.

Williamson Act Contract

Williamson Act Contracts are formed between a county or city and a landowner to restrict specific parcels of land to agricultural or related open space use in exchange for reduced property tax assessments. Private lands within locally designated agricultural preserve areas are also eligible for enrollment under a contract. The minimum term for contracts is 10 years; however, since the

contract term automatically renews annually, the actual term is essentially indefinite. Williamson Act Contracts are described in more detail in Section 3.17.4, Regulatory Framework. As shown in Exhibit 3.17-2, none of the potential sites for rezoning are encumbered by a Williamson Act Contract.

Agricultural Designations

All the potential sites for rezoning are designated for uses other than agricultural uses (see Exhibit 2-4a in Chapter 2, Project Description). Site 1 (Lester), 14 (St. Elizabeth Seton), 26 (St. Augustine) are all zoned Agriculture (A); and a portion of Site 1 (Lester) is pre-zoned as Agriculture (A). (see Exhibit 2-4b in Chapter 2, Project Description). Although all of the above-noted sites nominally have an “A” zoning designation, the City broadly uses this Zoning designation on parcels containing parks, public or private open space, and/or natural resources. Of the various sites noted above, only Site 1 (Lester) has any historic agricultural use.

Timber Land and Forest Land

Pursuant to California Public Resources Code Section 4526, timberland is defined as “. . . land, other than land owned by the federal government and land designated by the board as experimental forest land, which is available for, and capable of, growing a crop of trees of a commercial species used to produce lumber and other forest products, including Christmas trees . . .” Timberland zoned as Timberland Production, as defined by California Government Code Section 51104(g) is an area “. . . devoted to and used for growing and harvesting timber, or for growing and harvesting timber and compatible uses . . .” As mapped by the California Department of Fish and Wildlife (CDFW), none of the potential sites for rezoning are within private timberlands or public lands with forests.¹

3.17.3 - Regulatory Framework

State

California Department of Conservation Classification

The California Department of Conservation, Division of Land Resource Protection developed the FMMP in 1984 to analyze impacts to California’s agricultural resources. In the FMMP, land ratings are based on a land capability classification system, and land use.

California Public Resources Code

California Public Resource Code Section 4562 defines Forest Land and Timber Land as follows:

Forest Land

Land that can support 10 percent native tree cover of any species, including hardwoods, under natural conditions, and that allows for management of one or more forest resources, including timber, aesthetics, fish and wildlife, biodiversity, water quality, recreation, and other public benefits.

¹ California Department of Fish and Wildlife (CDFW). 2015. California Forests and Timberlands. Website: <https://nrm.dfg.ca.gov/FileHandler.ashx?DocumentID=109917&inline>
https://data.fs.usda.gov/geodata/rastergateway/forest_type/index.php. Accessed August 17, 2021.

Timber Land

Land, other than land owned by the federal government and land designated by the Board of Forestry and Fire Protection (Board) as experimental forest land, which is available for, and capable of, growing a crop of trees of any commercial species used to produce lumber and other forest products, including Christmas trees. Commercial species shall be determined by the Board on a District basis after consultation with the District committees and others.

Local

City of Pleasanton

City of Pleasanton General Plan

The General Plan, adopted July 21, 2009 and last amended August 20, 2019, provides a blueprint for anticipated growth and the conservation of resources. The General Plan is the official document used by decision-makers and citizens to guide the community's long-range development of land and conservation of resources. The General Plan contains a land use map, policies, and supporting information adequate for making informed decisions concerning the community's future.

The General Plan establishes the following goals, policies, and programs related to agriculture and forestry resources that are applicable to the Housing Element Update:

Conservation and Open Space Element

Goal 5 Preserve and protect existing and proposed open space lands for public health and safety, recreational opportunities, natural resources (e.g., agriculture, sand and gravel mining), sensitive viewsheds, and biological resources.

Goal 8 Promote agricultural production in accordance with sensitive environmental management practices and to preserve agricultural uses.

Land Use Element

Goal 1 Create a land use pattern that promotes resource sustainability and environmental quality.

Policy 20 In the Ridgeland, preserve the remaining agriculture open space.

Vineyard Avenue Corridor Specific Plan

The Vineyard Avenue Corridor Specific Plan includes the 384-acre area along Vineyard Avenue in southeast Pleasanton, and Site 27 (PUSD-Vineyard) is Lot 19. The Vineyard Avenue Corridor Specific Plan recognizes that permitted agricultural pursuits should be conducted in accordance with good practice and maintenance and not be deemed a nuisance. Objectives, policies, and guidelines regarding agricultural resources in the Vineyard Avenue Corridor Specific Plan include:

Measure D. Potential Agricultural/Non-Agricultural Use Conflicts

In order to help ensure protection, the recorded deed of sale of all subdivided parcels, and all property rental/lease agreements within the Vineyard Avenue Corridor Specific Plan area shall include a statement to be signed by the future owner/tenant stating that:

You are hereby advised that this property is located near land zoned and/or used for agricultural purposes. Agricultural use is defined as including but not limited to day- and night-time activity relating to livestock grazing, the keeping of livestock, the growing and processing of agricultural crops, and any commercial agricultural practices performed as incidental to or in conjunction with such operations. Some of the impacts associated with agricultural use include but are not limited to noise, odors, dust, chemicals, refuse, waste, unsightliness, use of agricultural equipment, and traffic. Permitted agricultural pursuits conducted in accordance with good practice and maintenance are not deemed by the City of Pleasanton to be a nuisance.

Measure E. Agricultural Mitigation Fee

Lots 18 through 28, 32, and 33 are included within the South Livermore Valley Area Plan (Area Plan) boundary and are further situated within a subarea of the Area Plan designated as the “Vineyard Avenue Transitional Area.” One of the provisions of the Area Plan requires that payment of a fee for certain development that occurs within certain portions of “transitional areas.” The purpose of the fee is to ensure that urban development compensates for the loss of cultivable or potentially cultivable soils through the payment of agricultural mitigation fees to fund the South Livermore Valley Agricultural Land Trust (Land Trust). Consistent with this provision, fees are to be collected by the City and distributed to the Land Trust at the time of subdivision map recordation for urban development projects proposed on Lots 18 through 28, 32, and 33. Fees are currently calculated based on a one-to-one ratio between the cost per acre for agricultural easements to the Land Trust and the net acreage of potentially cultivable soils less than 25 percent in slope lost to development.

Measure F

In November of 1993, Pleasanton voters approved Measure F, which was designed to preserve the remaining agricultural open space in the city and designate the Ridglands as Park and Recreation (for publicly owned land) and Agriculture (for privately-owned land). In those areas designated Agriculture, certain uses that would be incompatible with the existing visual quality were not identified as a permitted use.

Municipal Code

City of Pleasanton Right to Farm Ordinance

Chapter 17.48 of the Municipal Code is a “Right to Farm” Ordinance intended to protect agricultural productivity in the city. The ordinance states:

- A. The city council finds that commercially viable agricultural land exists within the city, and that it is in the public interest to enhance and encourage economically viable agricultural operations within the city. The city council also finds that residential and commercial development adjacent to certain agricultural lands often leads to restrictions on agricultural operations to the detriment of the adjacent agricultural uses and the economic viability of the city’s agricultural industry as a whole.
- B. The purposes of this chapter are to promote public health, safety and welfare and to support and encourage continued agricultural operations. This chapter is not to be construed as in any way modifying or abridging State law as set forth in the California Civil

Code, Health and Safety Code, Fish and Game Code, Food and Agricultural Code, Division 7 of the Water Code, or any other applicable provisions of State law relative to nuisances, rather it is only to be utilized in the interpretation and enforcement of the provision of this code and city regulations and provide a forum to discuss and resolve disputes to avoid litigation.

- C. This chapter is to promote a good neighbor policy between agricultural and nonagricultural property owners by providing owners of property adjacent to or near agriculture operations a forum to discuss problems resulting from agricultural operations including, but not limited to, the noises, odors, dust, chemicals, smoke and hours of operation that may accompany agricultural operations. It is intended that, through a discussion forum, property owners will understand the impact of living adjacent to or, near agricultural operations and be prepared to accept attendant conditions as the natural result of living in or near rural areas and agricultural operations. (Ord. 1633 § 1, 1994).

3.17.4 - Impacts and Mitigation Measures

Significance Criteria

The City, in its discretion, is utilizing State CEQA Guidelines Appendix G as the basis for thresholds of significance for evaluating impacts associated with the Housing Element Update. To determine whether impacts related to agriculture and forestry resources are significant environmental effects, the following questions are analyzed and evaluated. Would the Housing Element Update:

- a) Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland) as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to nonagricultural use?
- b) Conflict with existing zoning for agricultural use, or a Williamson Act Contract?
- c) Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code Section 12220(g)), timberland (as defined by Public Resources Code Section 4526), or timberland zoned Timberland Production (as defined by Government Code Section 51104(g))?
- d) Result in the loss of forest land or conversion of forest land to non-forest use?
- e) Involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland, to nonagricultural use or conversion of forest land to non-forest use?

Approach to Analysis

FirstCarbon Solutions (FCS) evaluated potential impacts on agricultural resources through review of the FMMP, Williamson Act maps, and applicable plans and policies.

Agriculture and forestry impacts associated with the development on the Dublin-Pleasanton Bay Area Rapid Transit (BART) station property were fully evaluated in the 2015-2023 (5th Cycle) Housing Element Draft Supplemental Environmental Impact Report (State Clearinghouse [SCH] No.

2011052002), and no additional impacts with respect to agricultural and forestry resources are associated with the Housing Element Update for the Dublin-Pleasanton BART station property; therefore, this analysis does not include the Dublin-Pleasanton BART station property.

Impact Evaluation

Conversion of Important Farmland to Nonagricultural Use

Impact AG-1: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland) as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to nonagricultural use.

Most of the land in the city and the potential sites for rezoning are designated as Urban and Built-up Land. Site 22 (Merritt) is the only potential site for rezoning with any mapped Important Farmland. Approximately 26.78 acres of the eastern portion of Site 22 (Merritt) is classified as Unique Farmland by the FMMP, (as shown in Exhibit 3.17-1, 10.94 acres of the site are classified as Grazing Land, and the remainder of the site, 8.85 acres, is classified as Urban and Built-up Land). However, the site is currently designated as Low Density Residential by the General Plan and, as the site is within unincorporated Alameda County, the City does not provide zoning for the site. Alameda County does not specify a zoning designation for Site 22 (Merritt). The site is not currently utilized for agriculture, nor has it been recently irrigated or used for crops. Furthermore, as indicated by the residential land use designation, the City has planned the site for residential uses, and Site 22 (Merritt) has been designated for low density residential uses since the 1986 General Plan. The Housing Element Update would redesignate the site PUD-LDR, which is consistent with the low density residential designation because it would allow low density residential uses on-site. Therefore, any potential loss of Unique Farmland would likely occur with or without implementation of the Housing Element Update. Therefore, impacts would be less than significant.

Site 27 (PUSD-Vineyard) is within the Vineyard Avenue Corridor Specific Plan. As described above, consistent with Section IV(D), the recorded deed of sale of all subdivided parcels and all property rental/lease agreements would include a statement to be signed by the future owner/tenant as provided above. In compliance with Section V(E), at the time of subdivision map recordation for urban development projects within Site 27 (PUSD-Vineyard), a payment of a one-to-one ratio (agricultural mitigation fee) between the cost per acre for agricultural easements and the net acreage of potentially cultivable soils less than 25 percent in slope lost to development would be paid to the South Livermore Valley Agricultural Land Trust.

None of the other potential sites for rezoning are mapped as Important Farmland, which precludes an impact related to conversion of Prime Farmland, Unique Farmland, or Farmland of Statewide Importance to nonagricultural uses. Therefore, the impacts are less than significant.

Level of Significance

Less than significant impact.

Conflict with Existing Zoning for Agricultural Use or Williamson Act Contract

Impact AG-2: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not conflict with existing zoning for agricultural use, or a Williamson Act Contract.

Agricultural Zoning

Aside from Sites 1 (Lester), 14 (St. Elizabeth Seton), and 26 (St. Augustine), none of the potential sites for rezoning have existing zoning designations that would allow for agricultural uses. A portion of Site 1 (Lester) is pre-zoned A and Sites 14 (St. Elizabeth Seton) and 26 (St. Augustine) are zoned A (see Exhibit 2-4b in Chapter 2, Project Description). The proposed pre-zoning designation for Site 1 (Lester) is Planned Unit Development: Low Density Residential, Agriculture, Open Space. This pre-zoning designation would allow for agricultural uses on-site, consistent with the existing zoning.

Sites 14 (St. Elizabeth Seton) and 26 (St. Augustine) are zoned for agricultural uses; however, Site 14 (St. Elizabeth Seton) is currently designated Medium Density Residential (MDR), and Site 26 (St. Augustine) is currently designated Public and Institutional (PI) by the General Plan, which would not allow the development of agricultural uses. The proposed Housing Element Update would redesignate Site 14 (St. Elizabeth Seton) as High Density Residential (HDR) with a Planned Unit Development: High Density Residential (PUD-HDR) zoning and would redesignate Site 26 (St. Augustine) as MDR with a Planned Unit Development: Medium Density Residential (PUD-MDR) zoning. These redesignations and rezonings would rectify the current inconsistencies between the General Plan land use designation and the zonings.

Because none of the other potential sites for rezoning are zoned for agricultural uses, the Housing Element Update would not conflict with existing zoning for agricultural uses on those sites. Therefore, the impacts are less than significant.

Williamson Act Contract

As shown in Exhibit 3.17-2, none of the potential sites for rezoning are encumbered by a Williamson Act Contract, which precludes an impact related to conflict with an existing Williamson Act Contract. Therefore, there is no impact.

Level of Significance

Less than significant impact.

Conflict with Existing Forest Land Zoning

Impact AG-3: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code Section 12220(g)), timberland (as defined by Public Resources Code Section 4526), or timberland zoned Timberland Production (as defined by Government Code Section 51104(g)).

None of the potential sites for rezoning contain any forest land or timberland, as defined by Public Resource Code Section 4526, nor do they contain any timberland zoned Timberland Production, as

defined by Government Code Section 51104(g). This condition precludes the possibility of the Housing Element Update conflicting with forest zoning of forest land or timberland. No impact would occur.

Level of Significance Before Mitigation

No impact.

Conversion of Forest Land to Non-Forest Use

Impact AG-4: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not result in the loss of forest land or conversion of forest land to non-forest use.

Aside from Site 1 (Lester), the potential sites for rezoning are adjacent to urbanized land uses, and do not contain any forest land. Site 1 (Lester) is surrounded to the northwest, west, and southwest by open space. However, that land is outside of the Urban Growth Boundary, and development would not be allowed on that land even with the approval of the Housing Element Update. This condition precludes the possibility of the development consistent with the Housing Element Update converting forest land to non-forest use. Therefore, no impacts would occur.

Level of Significance

No impact.

Other Changes to Convert Farmland to Nonagricultural Use or Forest Land to Non-Forest Use

Impact AG-5: Development consistent with the Housing Element Update, rezonings, and General Plan and Specific Plan Amendments would not involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland, to nonagricultural use or conversion of forest land to non-forest use.

As discussed above, most of the potential sites for rezoning are urban infill sites that are surrounded by development; several of them are currently developed. The land to the east of Sites 1 (Lester) and 22 (Merritt) is urbanized and/or designated for urbanized uses. With respect to Site 1 (Lester) and 22 (Merritt), to the west of those sites is land that is not yet urbanized. Portions of the area surrounding Site 1 (Lester) is designated as Agriculture and Grazing by the General Plan. With respect to Site 1 (Lester), the land designated for agriculture is outside of the Urban Growth Boundary, which precludes development on that land. With respect to Site 22 (Merritt), the land to the west of that site is designated as rural residential, and the development of housing on Site 22 (Merritt) would not result in conversion of the surrounding land to nonagricultural uses.

As explained more fully above, there is no forest land within the City's SOI. This condition precludes the possibility of the Housing Element Update converting forest land to non-forest uses.

Therefore, impacts related to the conversion of Farmland to nonagricultural use or forest land to non-forest use would be less than significant.

Level of Significance

Less than significant impact.

3.17.5 - Cumulative Impacts

The geographic scope of the cumulative impact analysis for land use and planning is the Tri-Valley Planning Area, which includes the City of Pleasanton as well as the surrounding cities of Dublin, Livermore, San Ramon, and the Town of Danville. This analysis evaluates whether the impacts of the Housing Element Update, together with the impacts of cumulative development, would result in a cumulatively significant impact related to agricultural resources. This analysis then considers whether incremental contribution to cumulative impacts associated with the implementation of the Housing Element Updated would be significant. Both conditions must apply for a project's cumulative effects to rise to a level of significance.

Agriculture Resources

Much of the Tri-Valley Planning Area includes urbanized uses with limited agricultural land. Much of the land that is designated for agricultural use is outside of the respective Urban Growth Boundary (UGB) or within unincorporated Alameda and Contra Costa counties. Similarly, much of the Important Farmland as mapped by the FMMP is either on the outskirts of the cities of Dublin, Livermore, and San Ramon and the Town of Danville or within unincorporated Alameda and Contra Costa counties. Therefore, the lands designated and mapped by the FMMP as agricultural land are not slated to be converted to nonagricultural uses. The Housing Element Update would not result in the conversion of any land mapped as Important Farmland that is not currently designated for residential uses, nor would it facilitate the conversion of agricultural land. However, if any individual cumulative development project would require the conversion of land from agricultural land to nonagricultural land in the future, the conversion would take place pursuant to State, regional, and local regulations.

As discussed above, though a portion of Site 22 (Merritt) is mapped as Unique Farmland, as indicated by the residential land use designation, the City has planned the site for residential uses and therefore any potential loss of Unique Farmland would likely occur with or without implementation of the Housing Element Update. Development consistent with the Housing Element Update would not conflict with existing zoning for agricultural uses or any Williamson Act Contracts. For these reasons, the Housing Element Update's incremental contribution to the less than significant cumulative impacts would be considered less than significant.

Forestry Resources

Similar to the relevant geographic scope for agricultural resources described above, the geographic scope of this cumulative analysis with respect to forestry resources includes lands within the Tri-Valley Planning Area. As mapped by the CDFW, there are small pockets of land within the Tri-Valley Planning Area that include private timberlands or public lands with forests.² However, it is likely that development within the Tri-Valley Planning Area will predominately occur within already urbanized areas.

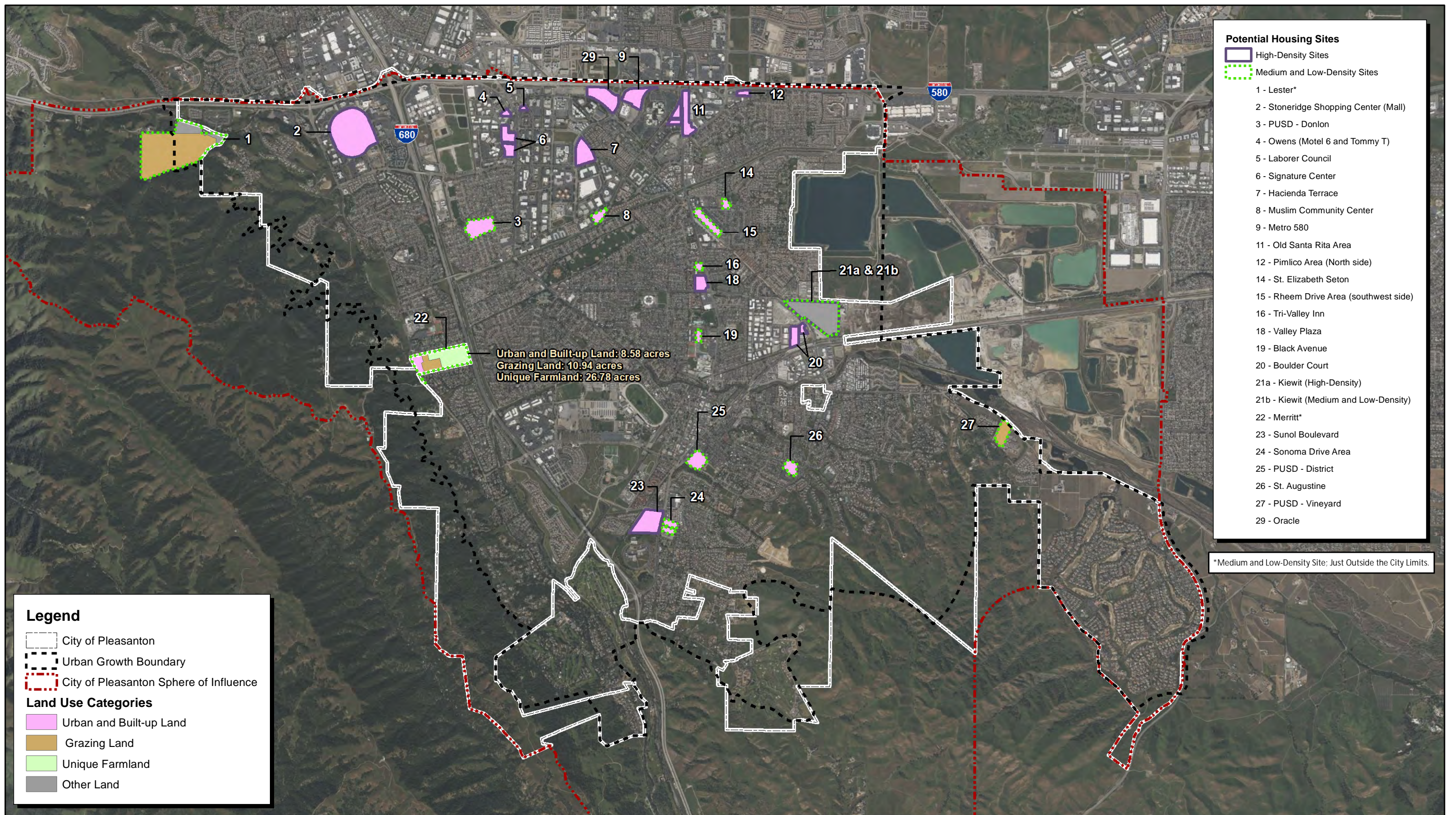
² California Department of Fish and Wildlife (CDFW). 2015. California Forests and Timberlands. Website: <https://nrm.dfg.ca.gov/FileHandler.ashx?DocumentID=109917&inline>
[.https://data.fs.usda.gov/geodata/rastergateway/forest_type/index.php](https://data.fs.usda.gov/geodata/rastergateway/forest_type/index.php). Accessed July 14, 2022.

The Tri-Valley Planning Area is a generally urbanized region, and it does not contain forest land or timberland, as defined by Public Resource Code Section 4526, nor does it contain any timberland zoned Timberland Production, as defined by Government Code Section 51104(g). Therefore, the cumulative projects would not conflict with forest zoning or converting forest land to non-forest use, and thus there would be no significant cumulative impact in this regard.

This condition precludes the possibility of the Housing Element Update, in conjunction with the cumulative projects, to conflict with forest zoning or converting forest land to non-forest use. Therefore, the Housing Element Update would not have a cumulatively considerable contribution to any significant cumulative impact with respect to forestry resources.

Level of Cumulative Significance

Less than significant impact.



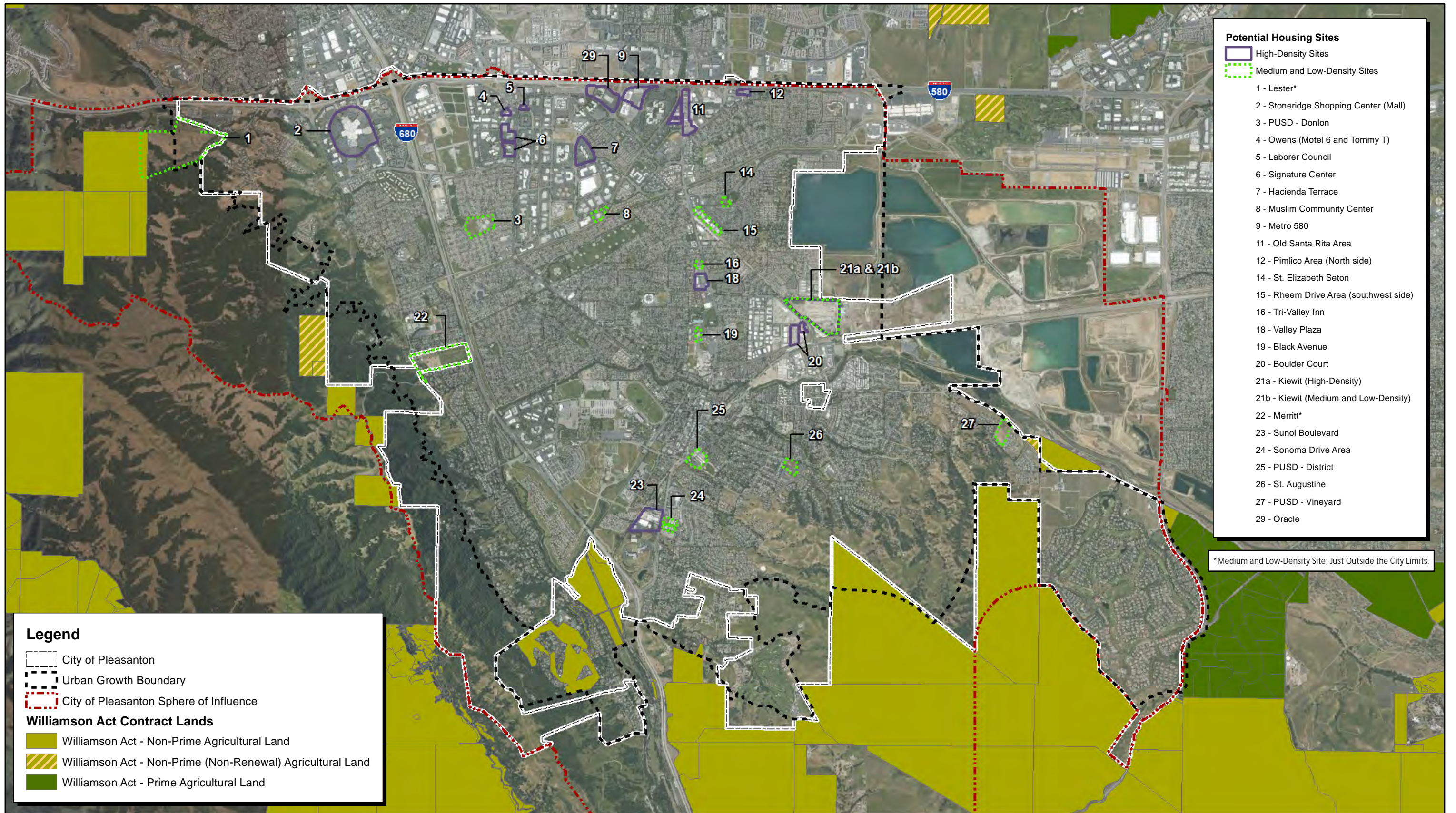
Source: Bing Aerial Imagery, Farmland Mapping and Monitoring Program.



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Exhibit 3.17-1
Alameda County Important Farmland 2018

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Source: Bing Aerial Imagery, Farmland Mapping and Monitoring Program.



Exhibit 3.17-2
Williamson Act Contract Lands

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CHAPTER 4: EFFECTS FOUND NOT TO BE SIGNIFICANT

4.1 - Introduction

This chapter is based, in part, on the City of Pleasanton Notice of Program EIR Preparation and Notice of Program EIR Public Scoping Meeting, dated April 6, 2022, and contained in Appendix A of this Draft Program Environmental Impact Report (EIR). The Notice of Preparation (NOP) was prepared to identify the potentially significant effects of the proposed 2023-2031 (6th Cycle) Housing Element Update, rezonings, General Plan and Specific Plan Amendments (collectively referred to herein as the Housing Element Update). The NOP was circulated for public review between April 6, 2022, and May 5, 2022. During the NOP evaluation, certain impacts were found to be less than significant, because development consistent with the Housing Element Update would not result in such impacts.

This chapter provides a brief description of potential effects to mineral resources, which were found not to be significant based on the NOP, the NOP public comments received, and/or more detailed analysis conducted as part of the EIR preparation process. No NOP public comments were received related to Mineral Resources.

Please note that several impacts that were also found to be less than significant are addressed in the various EIR topical sections (Sections 3.1 through 3.17). The analysis in those topical sections provides a more expansive discussion of why those certain impacts were found to be less than significant, to better inform decision makers and the public.

4.2 - Environmental Effects Found not to be Significant

4.2.1 - Mineral Resources

Loss of Mineral Resources of Statewide or Local Importance

Most of the sites are urban infill sites and are developed or partially developed with existing uses (see Table 2-1 in Chapter 2, Project Description). No activities related to mineral resources currently occur within the potential sites for housing and none of the sites are designated for this use. These conditions preclude the possibility of impacts on mineral resources; therefore, there is no impact associated with mineral resources.

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CHAPTER 5: OTHER CEQA CONSIDERATIONS

California Environmental Quality Act (CEQA) Guidelines Section 15126 requires that all aspects of a project must be considered when evaluating its impact on the environment, including planning, acquisition, development, and operation. As part of this analysis, the Draft Program Environmental Impact Report (Draft Program EIR) must also identify: (1) significant environmental effects of the proposed 2023-2031 (6th Cycle) Housing Element Update, rezonings, General Plan and Specific Plan Amendments (collectively referred to herein as the Housing Element Update); (2) significant environmental effects which cannot be avoided if the Housing Element Update is implemented; (3) significant irreversible environmental changes which would be involved in the Housing Element Update should it be implemented; (4) growth-inducing impact of the Housing Element Update; (5) mitigation measures proposed to minimize the significant effects; and (6) alternatives to the Housing Element Update.

This chapter provides a discussion of other CEQA-mandated topics, including significant unavoidable impacts, growth inducement, and significant irreversible environmental changes which would be involved in the Housing Element Update should it be implemented. Chapter 3, Environmental Impact Analysis, describes the significant environmental effects of the Housing Element Update and provides mitigation measures proposed to minimize significant effects. Chapter 6, Alternatives to the Proposed Project, discusses alternatives to the Housing Element Update.

5.1 - Significant Unavoidable Impacts

State CEQA Guidelines Section 15126.2(c) requires an EIR to identify and focus on the significant environmental effects of a project, including effects that cannot be avoided if a project were implemented.

The Housing Element Update was analyzed for potentially significant impacts related to each of the environmental issues discussed in Sections 3.1 through 3.17. The results of the analysis indicate that the Housing Element Update would result in the following significant and unavoidable impacts:

- **Project-Level Vehicle Miles Traveled:** Many of the potential sites for rezoning are located in areas which are expected to generate a home-based VMT per resident above the relevant threshold of significance. Mitigation Measure (MM) TRANS-2 requires individual housing project development proposals that do not screen out from a VMT impact analysis to provide a quantitative VMT analysis and, if results indicate the VMT associated with the individual housing project would be above the threshold, it would be required to include VMT reduction measures as provided in MM TRANS-2. Combining reduction measures reduces their effectiveness resulting in a cap on the total VMT reduction these measures can provide. Because the effectiveness of the measures in reducing an individual development project's VMT impact to a less than significant level cannot be confirmed in this analysis, the impact would remain significant and unavoidable.

- **Cumulative Vehicle Miles Traveled:** Cumulative projects in the nine-county Bay Area will generate new VMT, which would be added to the roadway network within the geographic context. All cumulative projects would be required to comply with applicable local regulations and General Plan policies that address VMT, as well as mitigate their fair share of impacts related to VMT. Nonetheless, the Housing Element Update, in conjunction with other past, present, and future projects, would have a cumulatively significant impact related to VMT. Development consistent with the Housing Element Update would result in a significant and unavoidable cumulatively considerable contribution to the existing cumulative VMT impact even with mitigation incorporated. Even with incorporation of MM TRANS-2, the City may not achieve the overall VMT threshold reduction level due to uncertainty in the cumulative effectiveness of the measures included in MM TRANS-2 as well as unknowns related to transit service levels, transportation technology, and travel behavior. Moreover, these policies and measures primarily apply to new developments; existing land uses that have already been approved and are under construction are generally not affected. Because of the programmatic nature of the Housing Element Update, no additional mitigation measures are available, and the cumulative impact is considered significant and unavoidable.
- **Project-Level Water Supply:** With all the City's groundwater supply wells potentially being taken out of commission in 2023, and unless the supply is either replaced or restored, there would be a significant projected water supply deficiency for all years reported in this Draft Program EIR. The deficiency ranges from approximately 12 percent to approximately 25 percent.¹ Without the groundwater supply, there would not be enough water available to account for development consistent with the Housing Element Update unless alternative water supplies are identified, such as purchasing additional water from Zone 7, or the City pursues a groundwater wells rehabilitation project which would allow it to resume use of local groundwater. Although Zone 7 has sufficient supplies available, because the City is still evaluating options for additional water and has not finalized additional supplies at time of publication of this Draft Program EIR, the potential water supply deficiency is considered significant for the purposes of this analysis. Therefore, although the analysis provided in this Draft Program EIR is conservative, decommissioning all of the City's groundwater supply wells would result in projected water supply that would not be sufficient to accommodate development consistent with the Housing Element Update and there is no mitigation available to reduce impacts to a less than significant level. Therefore, this impact would remain significant and unavoidable.
- **Cumulative Water Supply:** With all the City's groundwater supply wells potentially being taken out of commission in 2023, and unless the supply is either replaced or restored, there would be a significant projected water supply deficiency for all years reported in this Draft Program EIR. The cumulative deficiency ranges from approximately 12 percent to approximately 30

¹ As discussed in Section 3.15, Utilities and Service Systems, the Housing Element Update is anticipated to result in a deficiency of approximately 12 to approximately 25 percent (see Table 3.15-8 in Section 3.15, Utilities and Service Systems), whereas the water demand for the Housing Element Update and the anticipated additional growth is anticipated to result in a deficiency of approximately 12 to 30 percent (see Table 3.15-10 in Section 3.15, Utilities and Service Systems).

percent.² Without the groundwater supply, there would not be enough water available to account for cumulative development. In addition, as discussed in the Water Supply Assessment (WSA), based on 2020 Urban Water Management Plan reported City water supply and demand values, the decommissioning of all City groundwater wells would create a projected water supply deficiency in the City even without implementation of the Housing Element Update. As discussed in this Draft Program EIR, the City is actively exploring alternative water supply options to account for the loss of groundwater supply, such as purchasing additional water from Zone 7, or groundwater wells rehabilitation project, which would allow it to resume use of local groundwater. Although Zone 7 has sufficient supplies available, because the City is still evaluating options for additional water and has not finalized additional supplies at time of publication of this Draft Program EIR, the potential water supply deficiency is considered significant for the purposes of this analysis. Therefore, although the analysis provided in this Draft Program EIR is conservative, decommissioning all of the City's groundwater supply wells would result in projected water supply that would not be sufficient to accommodate cumulative development and there is no mitigation available to reduce this cumulative impact to a less than significant level. Therefore, this cumulative impact would be significant and unavoidable.

5.2 - Growth-inducing Impacts

There are two types of growth-inducing impacts that a project may have: direct and indirect. To assess the potential for growth-inducing impacts, the project's characteristics that may encourage and facilitate activities that individually or cumulatively may affect the environment must be evaluated (CEQA Guidelines § 15126.2(e)). State CEQA Guidelines, as interpreted by the City, state that a significant growth-inducing impact may result if the Housing Element Update would:

- Induce substantial population growth in an area (for example, by proposing new homes and commercial or industrial businesses beyond the land use density/intensity envisioned in the General Plan);
- Substantially alter the planned location, distribution, density, or growth rate of the population of an area; or
- Include extensions of roads or other infrastructure not assumed in the City of Pleasanton General Plan (General Plan) or adopted Capital Improvements Project list, when such infrastructure exceeds the needs of the project and could accommodate future developments.

Direct growth-inducing impacts occur when the development of a project imposes new burdens on a community by directly inducing unplanned population growth, or by leading to the construction of additional developments in the same area. Also included in this category are projects that remove

² As discussed in Section 3.15, Utilities and Service Systems, the Housing Element Update is anticipated to result in a deficiency of approximately 12 to approximately 25 percent (see Table 3.15-8 in Section 3.15, Utilities and Service Systems), whereas the water demand for the Housing Element Update and the anticipated additional growth is anticipated to result in a deficiency of approximately a deficiency of approximately 12 to 30 percent (see Table 3.15-10 in Section 3.15, Utilities and Service Systems).

physical obstacles to population growth (such as a new road into an undeveloped area or a wastewater treatment plant with excess capacity that could allow additional development in the service area).

Construction of these types of infrastructure projects cannot be considered isolated from the development they facilitate and serve. Projects that physically remove obstacles to growth, or projects that indirectly induce growth may provide a catalyst for future unrelated development in an area such as a new residential community that requires additional commercial uses to support residents.

The city currently has 28,602 housing units. The Housing Element Update does not propose or entitle any specific development that would directly increase growth. Additionally, the Housing Element Update cannot predict when any particular development would occur; however, the Housing Element Update anticipates approximately 7,787 net new housing units, for a total of 36,389 housing units by 2031. Although the City is required to plan for housing development, the Housing Element Update does not directly approve or result in any specific construction, or require the construction, of any housing. Instead, the identification of potential sites for housing is intended to plan for and encourage cohesive housing development; development by property owners and developers is predominantly dependent on market forces. In some locations, it would allow increased development intensity and/or a more inclusive mix of land uses compared to existing conditions. Therefore, the Housing Element Update removes some regulatory obstacles to growth to accommodate anticipated growth.

At buildout of the Housing Element Update, the population of the city is projected to be approximately 96,400; 18,029 of which could be attributed to the rezonings facilitated by the Housing Element Update at full buildout. Any indirect population growth associated with the Housing Element Update (i.e., jobs associated with the development of commercial space on Site 18 [Valley Plaza]) is already assumed and would be consistent with the growth projected in the Housing Element Update. As discussed in Section 3.12, Population and Housing, in preparing the Regional Housing Needs Allocation (RHNA), the Association of Bay Area Governments (ABAG) convened the Housing Methodology Committee (HMC)³ in October 2019 to provide guidance to staff on the methodology to distribute to each local government a fair share of the region's total housing need. The HMC recommended a methodology that advances the five RHNA objectives identified in Housing Element Law and is consistent with the forecasted development pattern from Plan Bay Area 2050. Because the Housing Element Update would provide sufficient sites to accommodate the RHNA allocation for the City, it is also consistent with the planned growth in Plan Bay Area 2050.⁴

The City is already served by existing services (fire, police and recreation) and infrastructure (roads, freeways, railroads, transit, sewer, storm drainage, telecommunication, electricity, and natural gas). As such, implementation of the Housing Element Update would not likely require extensions of telecommunication, electrical, natural gas, sewer, or storm drainage utility infrastructure beyond

³ The Housing Methodology Committee (HMC) consisted of nine elected officials (one from each Bay Area county), 12 jurisdiction housing or planning staff (at least one from each county), 16 regional stakeholders representing diverse perspectives, from equity and open space to public health and public transit, and one partner from State government. The HMC Roster can be accessed here: <https://abag.ca.gov/our-work/housing/rhna-regional-housing-needs-allocation/housing-methodology-committee#:~:text=The%20HMC%20was%20a%20key,the%20Bay%20Area's%20housing%20challenges.>

⁴ Association of Bay Area Governments (ABAG). 2022. RHNA-Regional Housing Needs Allocation. Website: <https://abag.ca.gov/our-work/housing/rhna-regional-housing-needs-allocation>. Accessed September 2, 2022.

that which currently exists within the Planning Area. However, for undeveloped sites, future projects may require connections to existing infrastructure on or adjacent to those sites. Additionally, the development of future land uses facilitated by the Housing Element Update could require new infrastructure to establish adequate water supply; however, this infrastructure would support planned for growth consistent with the Housing Element Update. The Housing Element Update would not extend urban infrastructure other than to future projects within the City's Sphere of Influence (SOI), and thus would not induce growth in other areas outside the SOI. As such, the Housing Element Update would not result in indirect population growth through providing an extension of infrastructure or services, or through the removal of a barrier to growth.

The reasonably foreseeable environmental impacts resulting from the growth envisioned by the Housing Element Update are described in Chapter 3, Environmental Impact Analysis. As discussed in detail throughout Chapter 3, most of the potential environmental impacts would be avoided or lessened with adherence to federal, State, and local policies and implementation of proposed Housing Element Update policies, including policies related to growth management, and by implementation of mitigation measures. Therefore, by design, the Housing Element Update reduces most of the impacts of the growth it could otherwise have induced. Those impacts that cannot be reduced to a less than significant level are described in Section 5.1, Significant Unavoidable Impacts.

5.3 - Significant Irreversible Environmental Changes

As mandated by State CEQA Guidelines Section 15126.2(d), the Draft Program EIR must address significant irreversible environmental changes which would be caused by the Housing Element Update should it be implemented. Specifically, such an irreversible environmental change would occur if:

- The Housing Element Update would involve a large commitment of nonrenewable resources;
- Primary and secondary impacts would generally commit future generations to similar uses;
- The Housing Element Update involves uses in which irreversible damage could result from any potential environmental accidents associated with the Housing Element Update; or
- The proposed consumption of resources is not justified (e.g., the Housing Element Update results in wasteful use of energy).

Development consistent with the Housing Element Update could result in approximately 7,787 net new housing units. Because the City is largely fully built out, new development would primarily occur on parcels that already contain some existing homes or businesses and/or on vacant infill sites (Chapter 2, Project Description, Table 2-1 and Exhibit 2-3).

Construction of the development consistent with the Housing Element Update would include the consumption of resources that are not replenishable or which may renew so slowly to be considered nonrenewable. These resources would include the following: certain types of lumber and other forest products; aggregate materials used in concrete and asphalt such as sand, gravel, and stone; metals such as steel, copper, and lead; petrochemical construction materials such as plastics; and water. Fossil fuels such as gasoline and oil would also be consumed in the use of construction vehicles and

equipment. Consumption of building materials as described and energy is common to most other development in the region, and commitments of resources are not unique or unusual to the development consistent with the Housing Element Update. Development would not be expected to involve an unusual commitment of nonrenewable resources, nor be expected to consume any resources in a wasteful manner. Energy demands associated with construction of the future development projects are discussed in greater detail in Section 3.5, Energy, which concluded that construction-related impacts related to electricity and fuel consumption would be less than significant.

At operation, the Housing Element Update would include the consumption of energy as part of building operations and transportation activities (vehicle trips associated with implementation of the Housing Element Update). Fossil fuels would represent the primary energy source during operation of the future development projects, and the existing, finite supplies of these nonrenewable resources would be incrementally reduced as technology becomes more energy efficient. As discussed in Section 3.5, Energy, all new development in the city would be required to meet State energy efficiency regulations that include Title 24 Part 6 building energy efficiency standards that require new residential uses to meet a net zero energy use standard by 2025,⁵ that is met through installation of rooftop solar photovoltaics (PV) systems, enhanced insulation, and energy-efficient appliances. The Title 24 Part 6 requirements also require nonresidential buildings to be designed for increased energy efficiency standards. Other State energy efficiency regulations include Senate Bill (SB) 100 that requires 100 percent of retail sales of electricity to be generated from zero-carbon emission sources by 2045 and Executive Order N-79-20 that requires 100 percent of new passenger vehicles sold in California to be zero-emissions by 2035. In addition, compliance with the General Plan and Climate Action Plan 2.0 (CAP 2.0) policies and actions, adherence to the development standards in the Pleasanton Municipal Code and Zoning Ordinance, and compliance with federal, State, and local regulations, would ensure that implementation of the Housing Element Update would not result in wasteful, inefficient, or unnecessary consumption of energy because these policies and actions would minimize demands for energy resources and ensure their efficient use. Furthermore, the Housing Element Update would minimize petroleum fuel use for transportation by locating new housing and jobs near Bay Area Rapid Transit and other public transit facilities. As discussed in Section 3.5, Energy, and Section 3.14, Transportation, implementation of the Housing Element Update would result in an overall decrease in per capita transportation energy consumption with respect to transportation energy resources. As such, energy consumption related to per capita transportation would decrease from that experienced by the region's current per capita transportation energy consumption patterns. Thus, although the Housing Element Update would result in an irretrievable commitment of nonrenewable resources at operation, the resources would not be consumed inefficiently, unnecessarily, or wastefully.

Implementation of the Housing Element Update could result in an irreversible commitment of land uses from existing land uses (Chapter 2, Project Description, Exhibits 2-4a and 2-4b) to land uses proposed under the Housing Element Update (Chapter 2, Project Description, Exhibits 2-5a and 2-

⁵ Gensler. California's New Gold Standard for Net Zero Developments. Website: <https://www.gensler.com/blog/california-zero-net-energy-opportunities-for-developers>. Accessed September 28, 2022.

5b). Therefore, future generations would be committed to similar land uses and the irreversible long-term environmental changes discussed below.

The Housing Element Update would irreversibly increase the commitment of energy resources, potable water supply, wastewater treatment, solid waste disposal, and public services, such as providing police and fire services, to support development consistent with the Housing Element Update through its lifetime. Future housing development-related increases in water demand would be evaluated on a project-by-project basis, as applicable. In addition, existing wastewater, sewer, and solid waste facilities and infrastructure would be adequate to serve development consistent with the Housing Element Update. Compliance with the General Plan and CAP 2.0 policies and actions, as well as adherence to the development standards in the Pleasanton Municipal Code and Zoning Ordinance, and compliance with federal, State, and local regulations, and mitigation measures would minimize the significant effects of the environmental changes associated with the Housing Element Update to the maximum degree feasible.

The Housing Element Update may have the potential to cause significant environmental accidents through hazardous material releases into the environment by new residential uses. However, compliance with State law and implementation of a Storm Water Pollution Prevention Plan (SWPPP) during construction activities would ensure that future development would not create a significant hazard to the public or environment through reasonably foreseeable upset and accident conditions involving release of hazardous materials (see Section 3.8, Hazards and Hazardous Materials).

While development consistent with the Housing Element Update would increase resource consumption during construction and operation, it would also result in some benefits related to long-term resource consumption in the region. The Housing Element Update establishes a long-range planning framework to identify adequate sites for future housing developments to meet the housing needs in the region. Additionally, development consistent with the Housing Element Update would accommodate anticipated growth within existing developed areas. Prioritizing infill development protects natural lands and open space and reduces fossil fuel consumption attributable to longer commuting distances and lack of transit options. For these reasons, the irretrievable commitment of resources attributable to the Housing Element Update would not be considered significant.

5.4 - Substantial Effects on Human Beings

Public Resources Code Section 21083 requires lead agencies to make a finding of a “significant effect on the environment” if the environmental effects of a project will cause substantial adverse effects on human beings, either directly or indirectly.

Under this standard, a change to the physical environment that might otherwise be minor must be treated as significant if human beings would be significantly affected. This factor relates to adverse changes to the environment of people generally, and not to effects on particular individuals. While changes to the environment that could indirectly affect human beings would be represented by all of the designated CEQA issue areas, those that could directly affect human beings include air quality, geology and soils, hazards and hazardous materials, hydrology and water quality, noise, population

and housing, public services, recreation, transportation/traffic, utilities, and climate change, which are addressed throughout this Draft Program EIR. Development consistent with the Housing Element Update would comply with the programs and policies enumerated in the General Plan, including policies and programs proposed as part of the Housing Element Update, and would not result in significant and unavoidable impacts that would affect human beings, including, but not limited to sensitive receptors. Each type of impact with the potential to cause substantial adverse effects on human beings has been evaluated, and as discussed in detail in this Draft Program EIR, all of these potential impacts on human beings are either less than significant or can be mitigated to a less than significant level with the implementation of mitigation measures.

The Housing Element Update is intended to provide policy guidance for future decision-making and does not approve or entitle any specific development. The policies discussed throughout this Draft Program EIR are designed to promote and benefit the human environment through cohesive design. For example, Program 4.4 of the Housing Element Update requires individual projects to demonstrate adequate water supply. Goal 6 requires the City to plan for new development effectively to ensure housing is developed in a manner that reduces its environmental impacts by dispersing high-density housing throughout the community (Policy 6.1), encouraging residential infill (Policy 6.3), encouraging new housing integrate sustainable design and energy efficiency features (Policy 6.4), and encouraging new housing to be built in areas well served by public transit (Policy 6.5). For all of the reasons discussed in the entire administrative record, the Housing Element Update would have a less than significant adverse impact on human beings.

CHAPTER 6: ALTERNATIVES TO THE PROPOSED HOUSING ELEMENT UPDATE

6.1 - Introduction

In accordance with California Environmental Quality Act (CEQA) Guidelines Section 15126.6, this Draft Program Environmental Impact Report (Draft Program EIR) contains a comparative impact assessment of alternatives to the proposed Housing Element Update. The primary purpose of this section is to provide decision-makers and the public with a reasonable number of feasible project alternatives that could attain most of the basic project objectives, while avoiding or reducing any of the project's significant adverse environmental effects. Important considerations for these alternatives analyses are noted below (as stated in CEQA Guidelines § 15126.6).

- An EIR need not consider every conceivable alternative to a project;
- An EIR should identify alternatives that were considered by the lead agency, but rejected as infeasible during the scoping process;
- Reasons for rejecting an alternative include:
 - Failure to meet most of the basic project objectives;
 - Infeasibility; or
 - Inability to avoid significant environmental effects.

Pursuant to CEQA, this chapter presents a meaningful comparative analysis of the proposed Housing Element Update and the alternatives (CEQA Guidelines § 15126.6(d)); identifies and discusses any alternatives that were considered by the lead agency but that it rejected as infeasible for detailed analysis in this EIR (CEQA Guidelines § 15126.6(c)); and provides comparative evaluation of the proposed project to a No Project Alternative (CEQA Guidelines § 15126.6(e)).

The CEQA Guidelines recommend that an EIR should briefly describe the rationale for selecting the alternatives to be discussed (CEQA Guidelines § 15126.6(c)). The nature and scope of the reasonable range of alternatives to be discussed is governed by the “rule of reason” and consistent with the goal of the alternatives analysis considers the following factors:

- The extent to which the alternative would accomplish most of the basic goals and objectives of the project;
- The extent to which the alternative would avoid or lessen the identified significant and unavoidable environmental effect of the project;
- The feasibility of the alternative, taking into account site suitability, availability of infrastructure, general plan consistency, and consistency with other applicable plans and regulatory limitations;
- The extent to which an alternative contributes to a “reasonable range” of alternatives necessary to permit a reasoned choice; and

- The requirement of the CEQA Guidelines to consider a “No Project” alternative and to identify an “environmentally superior” alternative in addition to the No Project Alternative (CEQA Guidelines § 15126.6(e)).

6.2 - Project Objectives

State CEQA Guidelines, Section 15124(b), require that the project description in an EIR include “a statement of the objectives sought by the proposed project,” which should include “the underlying purpose of the project.” The underlying purpose of the proposed Housing Element Update is to accommodate the Regional Housing Needs Assessment (RHNA) and increase the inventory of land available for the development of housing that is compliant with State law and consistent with the General Plan. The following are the primary project objectives for the proposed Housing Element Update:

- Provide a vision for housing through 2031.
- Maintain the existing housing inventory to serve housing needs.
- Meet the City’s fair share of the regional housing need to accommodate projected population growth and meet existing housing needs within the City.
- Ensure capacity for development of new housing to meet the RHNA at all income levels.
- Encourage housing development where supported by existing or planned infrastructure while maintaining existing neighborhood character.
- Encourage, develop, and maintain programs and policies to meet existing projected affordable housing needs, including for special needs populations such as persons with disabilities, seniors, the unhoused, and larger households.
- Develop a vision for Pleasanton that supports sustainable local, regional, and State housing and environmental goals.
- Provide new housing communities with substantial amenities to provide a high quality of life for residents.
- Adopt a housing element that complies with California Housing Element Law and can be certified by the State Department of Housing and Community Development (HCD).

6.3 - Purpose of a Housing Element

State law dictates that each city and county in California evaluate local housing needs and, as part of the Housing Element, prepare a realistic set of policies and programs to fulfill those needs in conjunction with the local government’s long-range General Plan. Each city and county must maintain a General Plan as a guide for the physical development of the community. This required evaluation of housing needs and resulting program and policies is included as the “Housing Element” of a local government’s General Plan.

Housing Element Law mandates that local governments must appropriately plan to meet the existing and projected housing needs of all economic segments of the community, from very low income (less than 50 percent of Area Median Income [AMI]) to above moderate income (above 120 percent of AMI). The law recognizes that local governments must adopt land use plans and regulatory systems to provide opportunities for housing production to support the private market in adequately addressing housing needs and demands. The law also requires that the HCD review local housing elements to ensure compliance with State law and report their findings to local governments. Although the Housing Element Update provides policies and programs that are meant to guide new housing construction, the Housing Element Update does not propose any specific development projects, nor does the law require the City of Pleasanton to construct, or approve the construction of, any particular project. Each city and county in the State of California is required to prepare regular updates of the Housing Element. Each jurisdiction within the Bay Area Region, which includes Pleasanton, must prepare an updated Housing Element for the 6th planning cycle, which covers the 2023–2031 period.

6.4 - Significant Unavoidable Impacts

The proposed Housing Element Update would result in the following significant unavoidable impacts:

- **Project-Level Vehicle Miles Traveled:** Many of the potential sites for rezoning are located in areas which are expected to generate a home-based Vehicle Miles Traveled (VMT) per resident above the relevant threshold of significance. Mitigation Measure (MM) TRANS-2 requires individual housing project development proposals that do not screen out from a VMT impact analysis to provide a quantitative VMT analysis and, if results indicate the VMT associated with the individual housing project would be above the threshold, it would be required to include VMT reduction measures as provided in MM TRANS-2. Combining the reduction measures reduces their effectiveness resulting in a cap on the total VMT reduction these measures can provide. Because the Housing Element Update does not include the approval of any specific project, the effectiveness of the measures in reducing an individual development project's VMT impact to a less than significant level is entirely speculative and cannot be confirmed in this analysis. Therefore, the impact would remain significant and unavoidable.
- **Cumulative Vehicle Miles Traveled:** Cumulative projects in the nine-county Bay Area will generate new VMT, which would be added to the roadway network within the geographic context. All cumulative projects would be required to comply with applicable local regulations and General Plan policies that address VMT, as well as mitigate their fair share of impacts related to VMT. Nonetheless, the Housing Element Update, in conjunction with other past, present, and future projects, would have a cumulatively significant impact related to VMT. Development consistent with the Housing Element Update would result in a significant and unavoidable cumulatively considerable contribution to the existing cumulative VMT impact even with mitigation incorporated. Even with incorporation of MM TRANS-2, the City may not achieve the overall VMT threshold reduction level due to uncertainty in the cumulative effectiveness of the measures included in MM TRANS-2 as well as unknowns related to transit

service levels, transportation technology, and travel behavior. Moreover, these policies and measures primarily apply to new developments; existing land uses that have already been approved and are under construction are generally not affected. Because of the programmatic nature of the Housing Element Update, no additional mitigation measures are available, and the cumulative impact is considered significant and unavoidable.

- **Project-level Water Supply:** With all the City’s groundwater supply wells potentially being taken out of commission in 2023, and unless the supply is either replaced or restored, there would be a significant projected water supply deficiency for all years reported in this Draft Program EIR. The deficiency ranges from approximately 12 percent to approximately 25 percent.¹ Without the groundwater supply, there would not be enough water available to account for development consistent with the Housing Element Update unless alternative water supplies are identified, such as purchasing additional water from Zone 7, or the City pursues a groundwater wells rehabilitation project, which would allow it to resume use of local groundwater. Although Zone 7 has sufficient supplies available, because the City is still evaluating options for additional water and has not finalized additional supplies at time of publication of this Draft Program EIR, the potential water supply deficiency is considered significant for the purposes of this analysis. Therefore, although the analysis provided in this Draft Program EIR is conservative, decommissioning all of the City’s groundwater supply wells would result in projected water supply that would not be sufficient to accommodate development consistent with the Housing Element Update and there is no mitigation available to reduce impacts to a less than significant level. Therefore, this impact would remain significant and unavoidable.
- **Cumulative Water Supply:** With all the City’s groundwater supply wells potentially being taken out of commission in 2023, and unless the supply is either replaced or restored, there would be a significant projected water supply deficiency for all years reported in this Draft Program EIR. The cumulative deficiency ranges from approximately 12 percent to approximately 30 percent.² Without the groundwater supply, there would not be enough water available to account for cumulative development. In addition, as discussed in the Water Supply Assessment (WSA), based on 2020 Urban Water Management Plan reported City water supply and demand values, the decommissioning of all City groundwater wells would create a projected water supply deficiency in the City even without implementation of the Housing Element Update. As discussed in this Draft Program EIR, the City is actively exploring alternative water supply options to account for the loss of groundwater supply, such as purchasing additional water from Zone 7, or a groundwater wells rehabilitation project, which would allow it to resume use of local groundwater. Although Zone 7 has sufficient supplies available, because the City is still evaluating options for additional water and has not finalized additional supplies at time of publication of this Draft Program EIR, the potential water supply

¹ As discussed in Section 3.15, Utilities and Service Systems, the Housing Element Update is anticipated to result in a deficiency of approximately 12 to approximately 25 percent (see Table 3.15-8 in Section 3.15, Utilities and Service Systems), whereas the water demand for the Housing Element Update and the anticipated additional growth is anticipated to result in a deficiency of approximately 12 to 30 percent (see Table 3.15-10 in Section 3.15, Utilities and Service Systems).

² As discussed in Section 3.15, Utilities and Service Systems, the Housing Element Update is anticipated to result in a deficiency of approximately 12 to approximately 25 percent (see Table 3.15-8 in Section 3.15, Utilities and Service Systems), whereas the water demand for the Housing Element Update and the anticipated additional growth is anticipated to result in a deficiency of approximately in a deficiency of approximately 12 to 30 percent (see Table 3.15-10 in Section 3.15, Utilities and Service Systems).

deficiency is considered significant for the purposes of this analysis. Therefore, although the analysis provided in this Draft Program EIR is conservative, decommissioning all of the City's groundwater supply wells would result in projected water supply that would not be sufficient to accommodate cumulative development and there is no mitigation available to reduce this cumulative impact to a less than significant level. Therefore, this cumulative impact would be significant and unavoidable.

6.5 - Alternatives Considered but Rejected from Further Evaluation

CEQA Guidelines Section 15126.6(c) requires an EIR to identify and briefly discuss any alternatives that were considered by the lead agency but were rejected as infeasible during the scoping process. In identifying alternatives, primary consideration was given to alternatives that would reduce significant impacts while still meeting most of the project objectives. Alternatives that would have the same or greater impacts as implementation of the proposed Housing Element Update, or that would not meet most of the objectives, were rejected from further consideration.

Alternative Regional Housing Needs Assessment Sites

Early in the Housing Element Update process, the City Council approved a list of site selection criteria to aid in the evaluation of potential sites for rezoning. The sites were ranked based on: (1) site size and infill criteria, (2) proximity to modes of transportation, (3) proximity to services and amenities, (4) environmental impacts/hazards, (5) impacts to sensitive resources, (6) height and mass compatibility, and (7) interest in site.

Staff presented an initial list of potential housing sites for consideration to the Planning Commission on November 10, 2021, and December 15, 2021, to the Housing Commission on November 18, 2021, and at a Community Meeting on December 1, 2021. Based on initial feedback from those meetings, the Planning Commission provided a recommendation to the City Council on a list of potential sites to be considered for future rezoning to allow residential development. On February 1 and 8, 2022, the City Council narrowed down the initial list of sites to 25 sites for inclusion in the environmental analysis and for consideration as part of the Site Inventory for the Housing Element Update. All meeting materials and draft documents are available for public review on the project website at <https://www.pleasantonhousingelement.com>.³

Because the City already completed an exhaustive evaluation of potential sites for rezoning, alternative sites would not meet the project objectives, and further evaluation of alternate sites as an alternative to the sites included in the proposed Housing Element Update would not be appropriate. Therefore, this alternative is rejected from further consideration.

³ On July 19, 2022, the City Council considered the Draft Housing Element and authorized its submittal to HCD for the Department's mandated review. Prior to that meeting, Pleasanton Unified School District (PUSD) requested that the Donlon Site be removed from consideration from rezoning, and the City Council agreed to remove the site from the Draft Housing Element. However, since the technical analysis for this Draft Program EIR was substantially complete by that time, the Draft Program EIR reflects Site 3 (PUSD-Donlon), resulting in a marginally more conservative analysis.

Other Land Use Alternative

An Other Land Use Alternative would include more broadly modifying other single-family and multi-family residential zoning to allow for increased density, while keeping their current land use designations. This would allow more residential units on some sites than is currently allowed (e.g., on sites currently designated for residential or mixed use)

Although this alternative could theoretically result in a residential capacity that could meet the City's RHNA obligation, it would likely be more challenging to do so, because that zoning approach would assume that numerous smaller sites would redevelop and/or infill existing development with additional units. And, due to the criteria established in State law with respect to suitable sites for high-density housing to accommodate lower-income housing needs, including maximum and minimum parcel size, this alternative is unlikely to meet the project objectives.

This alternative would not meet the majority of project objectives or achieve the underlying purpose of the proposed Housing Element Update as it unlikely to provide an adequate number of residential units to achieve the City's RHNA and would not provide a land use plan and regulatory systems to provide opportunities for housing production to support the private market in adequately addressing housing needs and demands, thus this alternative would not be in compliance with State law. Such an alternative would result in increased intensification for sites throughout the city and would be unlikely to avoid or substantially reduce potentially significant citywide or regional impacts related to transportation VMT as the proposed levels of development and growth would remain similar, and may in fact worsen those impacts by dispersing development away from transit, across broader areas of the city. Similarly, impacts to public services and public utilities (including water supply availability) would not be meaningfully reduced as levels of overall growth and demand for such services would remain relatively the same regardless of differences in allowable uses pursuant to the upzoning (e.g., commercial as opposed to residential). The basic purpose of an EIR's discussion of alternatives is to suggest ways project objectives might be achieved at less environmental cost. Consistent with this purpose, alternatives must be able to reduce one or more of a proposed project's impacts and attain and implement most of the project's basic objectives (4 California Code of Regulations [CCR] § 15126.6(a)). Therefore, this alternative is rejected from further consideration.

6.6 - Description of Alternatives Selected for Analysis

Pursuant to CEQA Guidelines Section 15126.6, this Draft Program EIR presents a range of reasonable alternatives to the proposed Housing Element Update for analysis and evaluation of their comparative merits. These alternatives are considered to cover the range of development alternatives that would meet the basic objectives of the proposed Housing Element Update while lessening one or more of its significant impacts. CEQA Guidelines Section 15126.6(a) states that an EIR need not evaluate every conceivable alternative to a project. Information has been provided for each alternative that would allow meaningful comparison with the proposed Housing Element Update.

CEQA requires that an EIR analyze a "no project" alternative (CEQA Guidelines § 15126.6(e)). Where, as here, this alternative means a project would not proceed, the discussion "[sh]ould compare the

environmental effects of the property remaining in its existing state against environmental effects which would occur if the project is approved” (CEQA Guidelines § 15126.6(e)(3)(B)).

Another type of alternative to be considered includes consideration of what could reasonably be expected in the foreseeable future if the project is not approved, based on current land use plans/designations/zoning and consistent with available infrastructure and community services.

The significant impacts of the proposed Housing Element Update are related to the residential development needed to meet identified objectives, both for the provision of housing to meet the needs of all economic segments of the community and to reduce VMT by improving the City’s jobs/housing balance. Thus, project alternatives, except the required No Project Alternative, represent various ways of increasing local housing opportunities compared with existing conditions. The RHNA requires accommodation of 5,965 total housing units in the 2023-2031 (6th Cycle) Housing Element Cycle.

6.6.1 - No Project Alternative

Pursuant to the requirements of CEQA, the No Project Alternative analysis must discuss existing conditions in the project area, as well as what would be reasonably expected to occur in the foreseeable future if a project were not approved and development continued to occur in accordance with existing plans and consistent with available infrastructure and community services (CEQA Guidelines § 15126.6 (e)(2)). According to the CEQA Guidelines:

When the project is the revision of an existing land use or regulatory plan . . . the ‘no project’ alternative will be the continuation of the existing plan . . . into the future. Typically, this is a situation where other projects initiated under the existing plan will continue while the new plan is developed.” (CEQA Guidelines § 15126.6 (e)(3)(A))

Here, the ‘existing plan’ would be the existing Housing Element (2015-2023), which is part of the current General Plan.

Under the No Project Alternative, the Housing Element would not be updated with new policies and no zoning or land use designation changes would occur. Future development would be in accordance with the current land use and zoning maps identified in the City of Pleasanton General Plan (General Plan). The existing Housing Element (2015-2023) plans for an increase of approximately 10,800 new residents and an addition of 3,243 housing units.⁴

The existing Housing Element addressed the housing needs for the 2015-2023 planning period. The document does not address housing needs for the 2023-2031 planning period, since a new RHNA has been assigned to the City, which substantially exceeds the prior RHNA. The existing Housing Element does not provide for an adequate inventory of housing for all economic segments of the community and the existing development capacity of residentially zoned land within the City of Pleasanton is inadequate to meet Pleasanton’s share of regional housing needs, requiring a 3,173

⁴ City of Pleasanton. 2014. Housing Element (2015-2023), Appendix A: Review and Assessment of 2007 Housing Element. June. Website: [chrome-extension://efaidnbmnnnibpcjpcglclefindmkaj/https://www.cityofpleasantonca.gov/pdf/Draft-HsgElem-June-2014.pdf](https://www.cityofpleasantonca.gov/pdf/Draft-HsgElem-June-2014.pdf). Accessed: October 17, 2022.

dwelling unit increase in the City’s residential development capacity (see Table 2-5 in Chapter 2, Project Description). Thus, under the No Project Alternative, the City would be left with an outdated Housing Element that sets forth an inventory of housing inadequate to meet identified housing needs through the current Housing Element planning period (2023-2031).

State law recognizes the vital role local governments play in the availability, adequacy, and affordability of housing. Every jurisdiction in California is required to adopt a long-range General Plan to guide its physical development; the Housing Element is one of the seven mandated elements of the General Plan. Housing element law mandates that local governments adequately plan to meet the existing and projected housing needs of all economic segments of the community. The law recognizes that for the private market to adequately address housing needs and demand, local governments must adopt land use plans and regulatory systems that provide opportunities for (and do not unduly constrain) housing production. Housing Element statutes also require the HCD to review local housing elements for compliance with State law and to report their findings to the local government.

California’s housing element law requires that each city and county develop local housing programs to meet its “fair share” of existing and future housing needs for all income groups. The Association of Bay Area Governments (ABAG) is responsible for developing and assigning these regional needs, via a RHNA, to Bay Area jurisdictions such as the City of Pleasanton. If the City fails to adopt a housing element or adopts one that is inadequate, as would occur under the No Project Alternative, a court can order the City to halt all development until an adequate element is adopted or order approval of specific affordable housing developments (California Government Code § 65583(f)).

State law requires the City to adopt a Housing Element that responds to the housing needs identified in the RHNA. Under the No Project Alternative, the existing Housing Element, General Plan, and zoning would remain in place, and the City would not have an inventory of land available for the development of housing capable of meeting the housing needs set forth in the RHNA.

Since the City must adopt and maintain a Housing Element for the 2023-2031 Housing Element planning period that provides an adequate inventory of land for residential development to meet Pleasanton’s RHNA allocation, the City does not have the option of selecting the No Project Alternative.

6.6.2 - Build Alternatives⁵

All build alternatives assume adoption of the City of Pleasanton 2023-2031 Housing Element Update including applicable General Plan, PUD, and Specific Plan Amendments and rezonings and the implementing policies and programs, provided as Appendix B to this Draft Program EIR. All alternatives would meet the 6th Cycle RHNA assigned to Pleasanton, based on an “assumed capacity” that reflects more conservative assumptions aligned with various criteria established by the State when determining the adequacy of a proposed Housing Element, and which accounts for aspects such as site constraints, market conditions, and other factors that may limit development. However,

⁵ Though the No Project Alternative could result in the development within the City, these alternatives are referenced as “build” alternatives for consistency with CEQA conventions and readability.

the alternatives analysis conservatively assumes that all sites would develop at their maximum allowable density (this methodology is in line with the methodology used throughout this Draft Program EIR).

The three build alternatives to the proposed Housing Element Update analyzed in this chapter are as follows:

- **Alternative 1, Remove Select Industrial and Commercial Sites:** Alternative 1, Remove Select Industrial and Commercial Sites, would remove some of the industrially/commercially zoned sites from the sites inventory list. Industrial zoned land and commercially zoned sites that allow for service commercial uses such as auto repair, is limited throughout the city, so this alternative aims to preserve the existing zoning on those properties. Some retail commercial sites are also excluded from this alternative, to reflect community concerns about loss of local-serving retail. This alternative would result in a maximum development potential of 5,065 units in addition to the existing residential zoning (2,792 units) for a total of 7,857 units.
- **Alternative 2, Transit-Oriented Focus:** Alternative 2, Transit-Oriented Focus, would focus on sites in proximity to transit for rezoning to residential uses. This alternative would remove the higher VMT sites as potential sites for rezoning and instead focus new housing on sites that would result in relatively lower VMT, although some selected, higher VMT sites, including Sites 1 (Lester), 22 (Merritt) and 23 (Sunol Boulevard), were retained in the alternative, either because the City is actively processing development applications for them (Sites 1 [Lester] and 22 [Merritt]), or because a site is necessary to provide adequate sites to meet the RHNA (Site 23 [Sunol]). This alternative would result in a maximum development potential of 5,754 units in addition to the existing residential zoning (2,792 units) for a total of 8,546 units.
- **Alternative 3, Site Rankings Focus:** Early in the Housing Element Update process, the City Council approved a list of sites selection criteria to aid in the evaluation of potential sites. The sites were ranked based on: (1) site size and infill criteria, (2) proximity to modes of transportation, (3) proximity to services and amenities, (4) environmental impacts/hazards, (5) impacts to sensitive resources, (6) height and mass compatibility, and (7) interest in site. This was used to create the initial list of sites for consideration for rezoning. In formulating the alternative, and to further refine the list, consideration was also provided as to feasibility, neighborhood compatibility (e.g., adjacency to existing residential uses), and support expressed by the community during the process to develop the Draft Housing Element Update. For Alternative 3, Site Rankings Focus Alternative, sites that scored lower based on these considerations and resultant site rankings would be removed. This alternative would result in a maximum development potential of 4,917 units in addition to the existing residential zoning (2,792 units) for a total of 7,709 units.

Residential uses were assumed for each potential site for rezoning as summarized in Table 6-1. Below, each of the build alternatives are described and their potential environmental impacts and ability to meet basic project objectives are compared with the proposed Housing Element Update. A comparison of the proposed Housing Element Update and the No Build Alternative is also provided. For the purposes of evaluating whether an alternative meets the housing needs identified in the RHNA, the existing residential zoning capacity (see Table 2-5 in Chapter 2, Project Description) is

included in Table 6-1. However, because sites with existing residential zoning capacity were already evaluated in the certified Supplemental Environmental Impact Report for the City of Pleasanton Housing Element and Climate Action Plan General Plan Amendment and Rezonings (the Supplemental EIR for the 4th Cycle Housing Element, State Clearinghouse [SCH] No. 2011052002), the alternatives analysis does not include those existing residentially zoned sites with respect to analysis of the environmental impacts associated with implementation of an alternative.

Table 6-1: Build Alternatives Summary

Map ID	Site	Proposed Housing Element Update ¹	Alternative 1: Remove Select Industrial and Commercial Sites	Alternative 2: Transit-Oriented Focus	Alternative 3: Site Rankings Focus
1	Lester	31	31	31	31
2	Stoneridge Shopping Center	1,440	1,440	1,440	1,440
3	PUSD-Donlon ²	28	Not Included in Alternative	Not Included in Alternative	Not Included in Alternative
4	Owens	94	94	94	Not Included in Alternative
5	Laborer Council	54	54	54	54
6	Signature Center	440	440	440	440
7	Hacienda Terrace	80	80	80	80
8	Muslim Community Center	125	125	125	125
9	Metro 580	375	375	375	375
11	Old Santa Rita	1,311	Not Included in Alternative	1,309	Not Included in Alternative
12	Pimlico Area (North side)	85	Not Included in Alternative	Not Included in Alternative	Not Included in Alternative
14	St. Elizabeth Seton	51	51	51	51
15	Rheem Drive	137	Not Included in Alternative	137	Not Included in Alternative
16	Tri-Valley Inn	62	62	62	62
18	Valley Plaza	220	Not Included in Alternative	220	Not Included in Alternative
19	Black Avenue	65	65	65	65
20	Boulder Court	378	Not Included in Alternative	Not Included in Alternative	Not Included in Alternative

Map ID	Site	Proposed Housing Element Update ¹	Alternative 1: Remove Select Industrial and Commercial Sites	Alternative 2: Transit-Oriented Focus	Alternative 3: Site Rankings Focus
21	Kiewit	760	760 ³	Not Included in Alternative	760 ³
22	Merritt	91	91	91	91
23	Sunol Boulevard	956	956	956	956
24	Sonoma Drive Area	163	Not Included in Alternative	Not Included in Alternative	Not Included in Alternative
25	PUSD-District	163	163	Not Included in Alternative	163
26	St. Augustine	29	29	Not Included in Alternative	Not Included in Alternative
27	PUSD-Vineyard	25	25	Not Included in Alternative	Not Included in Alternative
29	Oracle	225	225	225	225
Subtotal		7,388	5,065	5,754	4,917
Total Existing Residential Capacity		2,792	2,792	2,792	2,792
Total		10,180	7,857	8,546	7,709

Notes:

¹ Through the Housing Element Update process, the number of units in the Housing Element Update were updated slightly from the number of units analyzed in this Draft Program EIR. However, since the technical analysis for this Draft Program EIR was substantially complete by that time, the Draft Program EIR reflects the number of units as disclosed in the Notice of Preparation. The slight difference does not impact the analysis, or the conclusions provided throughout this document.

² On July 19, 2022, the City Council considered the Draft Housing Element and authorized its submittal to HCD for the Department’s mandated review. Prior to that meeting, Pleasanton Unified School District requested that the Donlon Site be removed from consideration from rezoning, and the City Council agreed to remove the site from the Draft Housing Element. However, since the technical analysis for this Draft Program EIR was substantially complete by that time, this Draft Program EIR continues to reflect the Donlon Site, resulting in a marginally more conservative analysis.

³ Combination of low/medium-density units

Source: City of Pleasanton 2022.

6.7 - Comparative Analysis of the Alternatives

This section presents a comparative discussion of the environmental effects of each alternative compared to the effects of implementation of the proposed Housing Element Update. For each alternative, this section discusses the significant and unavoidable impacts identified with the proposed Housing Element Update first and then discusses the less than significant impacts associated with the proposed Housing Element Update in comparison to each alternative.

As permitted by CEQA, the significant effects of the alternatives are discussed in less detail than are the effects of implementation of the proposed Housing Element Update (CEQA Guidelines §

15126.6(d)). However, the analysis of alternatives has been conducted at a sufficient level of detail to provide project decision-makers adequate information to fully evaluate the alternatives and to approve any of the alternatives without further environmental review. Unless otherwise indicated, the impacts associated with the proposed Housing Element Update and each alternative are for year 2031, the horizon year.

All impacts are described after implementation of any applicable mitigation measures identified in Chapter 3. Table 6-2, provided near the end of this chapter, summarizes the comparison of impacts for the proposed Housing Element Update and the alternatives.

6.7.1 - Comparison of Significant and Unavoidable Impacts Identified for the Proposed Housing Element Update with Alternatives

No Project Alternative

Transportation (Vehicle Miles Traveled)

The No Project Alternative would result in development consistent with the City's existing General Plan and would not encourage development of residential uses on any of the potential sites for rezoning. Although the General Plan would not rezone any of the potential sites for rezoning, it would allow these sites to be developed under their existing land use designations. Through the proposed rezoning, the proposed Housing Element Update provides a better jobs-housing balance than does the existing General Plan, thus reducing the overall VMT in the city as compared to the No Project. Therefore, though both the No Project Alternative and the proposed Housing Element Update result in significant unavoidable impacts with respect to VMT, the proposed Housing Element Update would have fewer traffic impacts than the No Project Alternative.

Utilities and Service Systems (Water Supply)

For the No Project Alternative, future development would be in accordance with the current land use and zoning maps identified in the General Plan, which would accommodate fewer residential units on the potential sites for rezoning, and, in some cases, no residential units on the potential sites for rezoning. The WSA⁶ prepared for the proposed Housing Element Update has indicated an approximately 20 percent shortfall in water supply, as it has been determined that all groundwater supply wells for the city will be taken out of commission no later than the first quarter of 2023. The City is currently developing plans to either remediate these well sites or find alternative sources of water. However, supply replacement options have not been confirmed and a final decision has not been made to replace the groundwater supply.

As the implementation of the proposed Housing Element Update would result in an increase in housing units in the City to accommodate the RHNA, the No Project Alternative, with its fewer number of housing units but possible development of sites under existing land use designations for residential, commercial and industrial uses, could decrease the shortfall in water supply, although the actual difference would depend on the nature of uses developed under existing zoning. However, as discussed in the WSA, based on 2020 UWMP reported City water supply and demand values, the decommissioning of all City groundwater wells would create a projected water supply

⁶ Watearth. 2022. City of Pleasanton Water Supply Assessment (WSA) for 2023-2031 Housing Element Update. October.

deficiency in the City even without implementation of the proposed Housing Element Update. Thus, even though the impact to water supply would be less, similar to the proposed Housing Element Update, the No Project Alternative would result in significant and unavoidable impacts. As noted above, the City is mandated to update the Housing Element and the No Project Alternative is not feasible.

Alternative 1—Remove Select Industrial and Commercial Sites

Transportation (Vehicle Miles Traveled)

This alternative would reduce the number of housing units compared to the proposed Housing Element Update while still meeting the City's RHNA. This alternative would reduce the amount of VMT, but, because several of the sites would still result in home-based VMT per resident by site above the thresholds as shown in Table 3.14-3 in Section 3.14, Transportation, it would not necessarily reduce VMT impacts to a level of less than significant even with implementation of MM TRANS-2 (which requires a quantitative VMT analysis for sites that do not screen out of such analysis, and the implementation of VMT reduction measures) for the reasons stated in Section 3.14, Transportation, of this Draft Program EIR. Similar to the proposed Housing Element Update, it is anticipated that this alternative would result in a significant and unavoidable impact.

Utilities and Service Systems (Water Supply)

This alternative would result in the development of fewer housing units than the proposed Housing Element Update and therefore may result in a decrease in the shortfall in water supply, although the actual difference would depend on the nature of uses developed under existing zoning. The WSA prepared for the proposed Housing Element Update has indicated an approximately 20 percent shortfall in water supply, as it has been determined that all groundwater supply wells for the city will be taken out of commission no later than the first quarter of 2023. The City is currently developing plans to either remediate these well sites or find alternative sources of water. However, supply replacement options have not been confirmed and a final decision has not been made to replace the groundwater supply. As discussed in the WSA, based on 2020 UWMP reported City water supply and demand values, the decommissioning of all City groundwater wells would create a projected water supply deficiency in the City even without implementation of the proposed Housing Element Update. Thus, even though this alternative would decrease the shortfall in water supply, similar to the proposed Housing Element Update, it would result in significant and unavoidable impacts.

Alternative 2—Transit-Oriented Focus

Transportation (Vehicle Miles Traveled)

This alternative would reduce the number of housing units compared to the proposed Housing Element Update while still meeting the City's RHNA. This alternative would concentrate residential development more heavily around transit centers than the proposed Housing Element Update, which would further reduce VMT.

However, although this alternative would reduce the amount of VMT, because several of the sites would still result in home-based VMT per resident by site above the thresholds as shown in Table 3.14-3 in Section 3.14, Transportation, it would not necessarily reduce VMT impacts to a level of less

than significant even with implementation of MM TRANS-2 (which requires a quantitative VMT analysis for sites that do not screen out of such analysis, and the implementation of VMT reduction measures) for the reasons stated in Section 3.14, Transportation, of this Draft Program EIR. Similar to the proposed Housing Element Update, it is anticipated that this alternative would result in a significant and unavoidable impact.

Utilities and Service Systems (Water Supply)

This alternative would result in the development of fewer housing units than the proposed Housing Element Update and therefore may result in a decrease in the shortfall in water supply, although the actual difference would depend on the nature of uses developed under existing zoning. The WSA prepared for the proposed Housing Element Update has indicated an approximately 20 percent shortfall in water supply, as it has been determined that all groundwater supply wells for the city will be taken out of commission no later than the first quarter of 2023. The City is currently developing plans to either remediate these well sites or find alternative sources of water. However, supply replacement options have not been confirmed and a final decision has not been made to replace the groundwater supply. As discussed in the WSA, based on 2020 UWMP reported City water supply and demand values, the decommissioning of all City groundwater wells would create a projected water supply deficiency in the City even without implementation of the proposed Housing Element Update. Thus, even though this alternative would decrease the shortfall in water supply, similar to the proposed Housing Element Update, the Transit-Oriented Focus Alternative would result in significant and unavoidable impacts.

Alternative 3—Site Rankings Focus

Transportation (Vehicle Miles Traveled)

This alternative would reduce the number of housing units compared to the proposed Housing Element Update while still meeting the City's RHNA. However, although this alternative would reduce the amount of VMT, because several of the sites would still result in home-based VMT per resident by site above the thresholds as shown in Table 3.14-3 in Section 3.14, Transportation, it would not necessarily reduce VMT impacts to a level of less than significant even with implementation of MM TRANS-2 (which requires a quantitative VMT analysis for sites that do not screen out of such analysis, and the implementation of VMT reduction measures) for the reasons stated in Section 3.14, Transportation, of this Draft Program EIR. Similar to the proposed Housing Element Update, it is anticipated that this alternative would result in a significant and unavoidable impact.

Utilities and Service Systems (Water Supply)

This alternative would result in the development of fewer housing units than the proposed Housing Element Update and therefore may result in a decrease in the shortfall in water supply, although the actual difference would depend on the nature of uses developed under existing zoning. The WSA prepared for the proposed Housing Element Update has indicated an approximately 20 percent shortfall in water supply, as it has been determined that all groundwater supply wells for the city will be taken out of commission no later than the first quarter of 2023. The City is currently developing plans to either remediate these well sites or find alternative sources of water. However, supply replacement options have not been confirmed and a final decision has not been made to replace the

groundwater supply. As discussed in the WSA, based on 2020 UWMP reported City water supply and demand values, the decommissioning of all City groundwater wells would create a projected water supply deficiency in the City even without implementation of the proposed Housing Element Update. Thus, even though this alternative would decrease the shortfall in water supply, similar to the proposed Housing Element Update, the Site Rankings Focus Alternative would result in significant unavoidable impacts.

6.7.2 - Comparison of Less Than Significant Impacts Identified for the Proposed Project with Alternatives

No Project Alternative

Implementation of the No Project Alternative would represent continuation of the City's existing General Plan and zoning to guide future residential development. Although the General Plan was amended in September 2010 to remove references to the housing cap of 29,000, that amendment did not alter the buildout projections of the General Plan. The adopted General Plan, last amended in August 2019, would result in an increase of approximately 10,800 new residents in an 3,243 housing units.⁷ The No Project Alternative would not allow the housing needs identified in the RHNA to be met, since there would be less opportunity for residential development, nor would the No Project Alternative further the goal of improving the City's jobs-housing balance—therefore it would have greater population and housing impacts compared to the proposed Housing Element Update.

The No Project Alternative has the least amount of residential development opportunity compared to the proposed Housing Element Update and other alternatives. The No Project Alternative would not achieve the RHNA requirements for affordable housing. Overall, the No Project Alternative would result in greater impacts associated with land use and planning because it would not improve the local jobs/housing balance and would leave the City with an outdated Housing Element that sets forth an inventory of land for the development of housing that falls short of RHNA objectives, and would not be compliant with State law. All other less than significant impacts under the proposed Housing Element Update would remain less than significant under this alternative. As the applicable environmental document under the No Project Alternative, the mitigation measures as laid out in the certified Supplemental Environmental Impact Report for the City of Pleasanton Housing Element and Climate Action Plan General Plan Amendment and Rezonings (the Supplemental EIR for the 4th Cycle Housing Element, State Clearinghouse [SCH] No. 2011052002) would apply to this alternative.

Alternative 1—Remove Select Industrial and Commercial Sites

This alternative results in a decreased development potential of housing units compared to the proposed Housing Element Update but would still fulfill 100 percent of the RHNA. The policies and programs outlined in the Housing Element Update would remain the same. The City would still be able to achieve its RHNA objectives.

All of the less than significant impacts under the proposed Housing Element Update would remain less than significant under this alternative, although in most cases, because there would be fewer

⁷ City of Pleasanton. 2014. Housing Element (2015-2023), Appendix A: Review and Assessment of 2007 Housing Element. June. Website: [chrome-extension://efaidnbmnnnibpcajpcglclefindmkaj/https://www.cityofpleasantonca.gov/pdf/Draft-HsgElem-June-2014.pdf](https://www.cityofpleasantonca.gov/pdf/Draft-HsgElem-June-2014.pdf). Accessed: October 17, 2022.

sites developed, the impact would be to a lesser degree than under the proposed Housing Element Update. No impacts would be more severe under this alternative because this alternative would result in less total growth than would occur under the proposed Housing Element Update and would not result in development on sites not already evaluated as part of the Draft Program EIR. However, although reduced compared to the proposed Housing Element Update, this alternative would result in the same significant and unavoidable impacts. Moreover, all mitigation measures identified for the proposed Housing Element Update would also apply for this alternative.

Alternative 2—Transit-Oriented Focus

This alternative results in decreased development potential of housing units compared to the proposed Housing Element Update but would still fulfill 100 percent of the RHNA. The policies and programs outlined in the Housing Element Update would remain the same, and the City would still be able to achieve its RHNA objectives.

All of the less than significant impacts under the proposed Housing Element Update would remain less than significant under this alternative, although in most cases, because there would be fewer sites developed, the impact would be to a lesser degree than under the proposed Housing Element Update. No impact would be more severe under this alternative because this alternative would result in less total growth than allowed under the proposed Housing Element Update. However, although reduced compared to the proposed Housing Element Update, this alternative would result in the same significant and unavoidable impacts. Moreover, all mitigation measures identified for the proposed Housing Element Update would also apply for this alternative.

Alternative 3—Site Rankings Focus

This alternative results in decreased development potential of housing units compared to the proposed Housing Element Update but would still fulfill 100 percent of the RHNA. The policies and programs outlined in the Housing Element Update would remain the same, and the City would still be able to achieve its RHNA objectives.

All of the less than significant impacts under the proposed Housing Element Update would remain less than significant under this alternative, although in most cases, because there would be fewer sites developed, the impact would be to a lesser degree than under the proposed Housing Element Update. No impacts would be more severe under this alternative because this alternative would result in less total growth than allowed under the proposed Housing Element Update. However, although reduced compared to the proposed Housing Element Update, this alternative would have the same significant and unavoidable impacts. Moreover, all mitigation measures identified for the proposed Housing Element Update would also apply for this alternative.

6.8 - Environmentally Superior Alternative

CEQA Guidelines Section 15126(e)(2) requires identification of an environmentally superior alternative. If the No Project Alternative is environmentally superior, CEQA requires selection of the “environmentally superior alternative other than the No Project Alternative” from among the project and the alternatives evaluated.

Based upon the evaluation described in this section, Alternative 2, Transit-Oriented Focus, would be the environmentally superior alternative given its reduced residential development potential resulting in a decrease in the shortfall in water supply. Because this alternative would result in the development of fewer sites, the associated environmental impacts would be less than those associated with the proposed Housing Element Update. As this alternative would focus new residential development near existing or planned transit centers, despite the reduction in housing units, this alternative would likely result in lower VMT than the proposed Housing Element Update. Though, as described above, this alternative would still result in a significant and unavoidable impact with respect to VMT and water supply. Although Alternatives 1 and 3 would also reduce the number of sites and units, Alternative 2 results in a more substantial reduction of transportation impacts compared to the other two.

Further, Alternative 2, Transit-Oriented Focus meets all the key objectives and goals of the Housing Element Update, as shown in Table 6-3. Namely, it would ensure capacity for the development of new housing to meet the RHNA at all income levels and present the HCD with a housing element that would meet RHNA and reduce VMT and water demand. For these reasons, Alternative 2 is considered the Environmentally Superior Alternative.

Each of the build alternatives would meet all the project objectives. The proposed Housing Element Update would accommodate the greatest number of housing units, but each of the build alternatives would exceed the City’s RHNA.

The qualitative environmental effects of each alternative in relation to the proposed Housing Element Update are summarized in Table 6-2.

Table 6-2: Summary of Alternatives

Environmental Topic Area	Proposed Housing Element Update	No Project Alternative	Alternative 1: Remove Select Industrial and Commercial Sites	Alternative 2: Transit-Oriented Focus	Alternative 3: Site Rankings Focus
Aesthetics	LTS	LTSM ≥	LTS ≈	LTS ≈	LTS ≈
Air Quality	LTSM	LTSM ≥	LTSM ≈	LTSM ≈	LTSM ≈
Biological Resources	LTSM	LTSM ≈	LTSM ≈	LTSM ≈	LTSM ≈
Cultural Resources and Tribal Cultural Resources	LTS	LTSM ≈	LTS ≈	LTS ≈	LTS ≈
Energy	LTS	LTS ≥	LTS ≈	LTS ≈	LTS ≈
Geology and Soils	LTSM	LTSM ≈	LTSM ≈	LTSM ≈	LTSM ≈
Greenhouse Gas Emissions	LTS	LTS ≥	LTS ≈	LTS ≈	LTS ≈
Hazards and Hazardous Materials	LTSM	LTSM ≈	LTSM ≈	LTSM ≈	LTSM ≈

Environmental Topic Area	Proposed Housing Element Update	No Project Alternative	Alternative 1: Remove Select Industrial and Commercial Sites	Alternative 2: Transit-Oriented Focus	Alternative 3: Site Rankings Focus
Hydrology and Water Quality	LTS	LTS ≈	LTS ≈	LTS ≈	LTS ≈
Land Use and Planning	LTS	LTS >	LTS ≈	LTS ≈	LTS ≈
Noise	LTSM	LTSM ≈	LTSM ≈	LTSM ≈	LTSM ≈
Population and Housing	LTS	LTS >	LTS ≈	LTS ≈	LTS ≈
Public Services and Recreation	LTS	LTS ≈	LTS ≈	LTS ≈	LTS ≈
Transportation	SUM	SUM ≥	SUM ≤	SUM ≤	SUM ≤
Utilities and Service Systems	SU	SU ≤	SU ≤	SU ≤	SU ≤
Wildfire	LTS	LTS ≈	LTS ≈	LTS ≈	LTS ≈
Agriculture and Forestry Resources	LTS	NI ≈	LTS ≈	LTS ≈	LTS ≈

Notes:
 NI = No Impact
 LTS = less than significant
 LTSM = less than significant with mitigation incorporated
 SU = significant and unavoidable
 SUM = significant and unavoidable with mitigation incorporated
 ≈ = impact is similar to the proposed Housing Element Update
 ≤ = impact is less than or equal to the proposed Housing Element Update
 ≥ = impact is greater than or equal to the proposed Housing Element Update
 < = impact is less than the proposed Housing Element Update
 > = impact is greater than the proposed Housing Element Update
 Source: FirstCarbon Solutions (FCS) 2022.

Table 6-3: Summary of Alternatives Meeting of Project Objectives

Objective	Proposed Housing Element Update	No Project Alternative	Alternative 1: Remove Select Industrial and Commercial Sites	Alternative 2: Transit-Oriented Focus	Alternative 3: Site Rankings Focus
Provide a vision for housing through 2031.	Yes	No	Yes	Yes	Yes
Maintain the existing housing inventory to serve housing needs.	Yes	Yes	Yes	Yes	Yes
Ensure capacity for development of new	Yes	No	Yes	Yes	Yes

Objective	Proposed Housing Element Update	No Project Alternative	Alternative 1: Remove Select Industrial and Commercial Sites	Alternative 2: Transit-Oriented Focus	Alternative 3: Site Rankings Focus
housing to meet the RHNA at all income levels.					
Encourage housing development where supported by existing or planned infrastructure while maintaining existing neighborhood character.	Yes	Yes, but to a lesser extent than the proposed Housing Element Update	Yes	Yes	Yes
Encourage, develop, and maintain programs and policies to meet existing projected affordable housing needs, including for special needs populations such as persons with disabilities, seniors, the unhoused, and larger households.	Yes	Yes, but to a lesser extent than the proposed Housing Element Update	Yes	Yes	Yes
Develop a vision for Pleasanton that supports sustainable local, regional, and State housing and environmental goals.	Yes	Yes, but to a lesser extent than the proposed Housing Element Update	Yes	Yes	Yes
Provide new housing communities with substantial amenities to provide a high quality of life for residents.	Yes	Yes, but to a lesser extent than the proposed Housing Element Update	Yes	Yes	Yes
Adopt a housing element that complies with California Housing Element Law and can be certified by the State Department of Housing and Community Development (HCD).	Yes	No	Yes	Yes	Yes
Source: FirstCarbon Solutions (FCS) 2022.					

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CHAPTER 7: PERSONS AND ORGANIZATIONS CONSULTED/LIST OF PREPARERS

7.1 - Lead Agency

7.1.1 - City of Pleasanton (CEQA Lead Agency)

Community Development Department

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Senior Planner Shweta Bonn
Associate Planner Megan Campbell

Livermore-Pleasanton Fire Department

Fire Chief Aaron Lacey

Police Department

Police Captain Larry Cox

Engineering Department

Director Steve Kirkpatrick

Operations Services Department

Director Kathleen Yurchak

Library and Recreation Department

Director Heidi Murphy
Assistant Director Lia Bushong
Assistant Director Michele Crose
Landscape Architect Matt Gruber
Parks Maintenance Superintendent Giacomo Damonte

7.1.2 - Public Agencies

State Agencies

Department of Toxic Substances Control

Project Manager Brian McAloon

Native American Heritage Commission

Chairperson Laura Miranda
Cultural Resources Analyst Cody Campagne

Local Agencies

Dublin San Ramon Services District

General Manager Daniel McIntyre
Assistant General Manager Jan Lee

Pleasanton Unified School District

Superintendent Dr. David Haglund
Assistant Superintendent Ahmad Sheikholeslami
Executive Director of Facilities and Construction John Chwastkyk

Zone 7 Water Agency

Water Resources Planner Elke Rank

7.2 - City of Pleasanton Consultants

7.2.1 - Lead Consultant

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