EXHIBIT E

Preliminary Tree Report

Kottinger Senior Housing Project
Pleasanton, CA

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HORT SCIENCE

Preliminary Tree Report
Kottinger Place
Pleasanton, CA

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Preliminary Tree Report
Kottinger Senior Housing Project
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Introduction and Overview

MidPen Housing is planning to redevelop four properties in Pleasanton: Kottinger Place, Pleasanton Gardens, Regalia House, and 4138 Vineyard Ave. Kottinger Place and Pleasanton Gardens are active low-income senior housing units; Regalia House contains one building, and 4138 Vineyard Ave. is a mostly cleared empty lot. HortScience, Inc. was asked to prepare a **Preliminary Tree Report** for the site as part of the development application to the City of Pleasanton. This report is preliminary in nature as the plans are in conceptual stage and accurate tree trunk locations have yet to be established.

This report provides the following information:

1. An evaluation of the health and structural condition of the trees within and adjacent to the proposed project area based on a visual inspection from the ground.
2. A preliminary assessment of the development impacts to the trees based on the plans provided by the client.
3. Preliminary guidelines for tree preservation during the design, construction and maintenance phases of development.

Tree Assessment Methods

Trees were assessed in June 2013. The survey included trees 6" in diameter and greater, located within the proposed project area. Trees located off-site that were either near the proposed project or had canopies extending over the site were included. The assessment procedure consisted of the following steps:

1. Identifying the tree as to species;
2. Tagging each tree with an identifying number and recording its location on a map;
3. Measuring the trunk diameter at a point 4.5' above grade;
4. Evaluating the health and structural condition using a scale of 1 – 5:

   5 - A healthy, vigorous tree, reasonably free of signs and symptoms of disease, with good structure and form typical of the species.

   4 - Tree with slight decline in vigor, small amount of twig dieback, minor structural defects that could be corrected.

   3 - Tree with moderate vigor, moderate twig and small branch dieback, thinning of crown, poor leaf color, moderate structural defects that might be mitigated with regular care.

   2 - Tree in decline, epicormic growth, extensive dieback of medium to large branches, significant structural defects that cannot be abated.

   1 - Tree in severe decline, dieback of scaffold branches and/or trunk; most of foliage from epicormics; extensive structural defects that cannot be abated.

5. Rating the suitability for preservation as "high", "moderate" or "low". Suitability for preservation considers the health, age and structural condition of the tree, and its potential to remain an asset to the site for years to come.

High: Trees with good health and structural stability that have the potential for longevity at the site.

Moderate: Trees with somewhat declining health and/or structural defects than can be abated with treatment. The tree will require more intense management and monitoring, and may have shorter life span than those in 'good' category.

Low: Tree in poor health or with significant structural defects that cannot be mitigated. Tree is expected to continue to decline, regardless of treatment. The species or individual may have characteristics that are undesirable for landscapes, and generally are unsuited for use areas.

City of Pleasanton Urban Tree Protection Requirements

The Pleasanton Municipal Code Chapter 17.16 controls the removal and preservation of heritage trees within the city. Heritage trees are defined as:

1. Any single-trunked tree with a circumference of 55" (18" in diameter) or more measured four and on half feet above ground level;
2. Any multi-trunked tree of which the two largest trunks have a circumference of 55" or more measured four and one half feet above ground level;
3. Any tree 35' or more in height;
4. Any tree of particular historical significance specifically designated by official action;
5. A stand of trees, the nature of which makes each dependent upon the other for survival or the area's natural beauty.

All trees with heritage designation are protected and require a permit for removal.

Description of Trees

The project site was characterized by a diverse tree population. One hundred seventy-seven (177) trees representing 52 species were evaluated (**Table 1**). All but seven trees were planted in the landscape surrounding the homes and in the adjacent Kottinger Village Park and adjacent private residences. Descriptions of each tree are found in the ***Tree Assessment Form*** and approximate locations are plotted on the ***Tree Assessment Map*** (see Exhibits).

Table 1. Condition Ratings and Frequency of Occurrence of Trees
Kottinger Senior Housing Project, Pleasanton, CA

Common name	Scientific name	Condition			
		Poor (1-2)	Fair (3)	Good (4-5)	Total
Bailey acacia	*Acacia baileyana*	1	-	-	1
Blackwood acacia	*Acacia melanoxylon*	-	1	-	1
Silver maple	*Acer saccharinum*	-	-	1	1
Strawberry tree	*Arbutus unedo*	-	-	1	1
European white birch	*Betula pendula*	2	-	-	2
Incense cedar	*Calocedrus decurrens*	-	1	-	1
Catalpa	*Catalpa sp.*	3	4	1	8
Hackberry	*Celtis occidentalis*	-	-	1	1
Chitalpa	*Chitalpa tashkentensis*	-	1	-	1
Arizona cypress	*Cupressus arizonica*	-	1	-	1

Common name	Scientific name	Condition			
		Poor (1-2)	Fair (3)	Good (4-5)	Total
Cabbage tree	*Cordyline australis*	-	1	-	1
Bronze loquat	*Eriobotrya deflexa*	-	1	-	1
River red gum	*Eucalyptus camaldulensis*	3	5	1	9
Silver dollar gum	*Eucalyptus polyanthemos*	-	4	2	6
Raywood ash	*Fraxinus augustifolia 'Raywood'*	-	3	5	8
Modesto ash	*Fraxinus velutina*	3	6	-	9
Ginkgo	*Ginkgo biloba*	-	1	1	2
California black walnut	*Juglans nigra*	1	3	-	4
English walnut	*Juglans regis*	-	2	-	2
Hollywood juniper	*Juniperus chinensis 'Torulosa'*	-	2	-	2
Crape myrtle	*Lagerstroemia indica*	-	-	1	1
Glossy privet	*Ligustrum lucidum*	1	1	1	3
Sweetgum	*Liquidambar styraciflua*	-	10	1	11
Southern magnolia	*Magnolia grandiflora*	-	1	2	3
Mayten	*Maytenus boaria*	2	3	-	5
Avocado	*Persea americana*	-	1	-	1
Canary Island date palm	*Phoenix canariensis*	-	-	1	1
Colorado spruce	*Picea pungens*	-	-	1	1
Canary Island pine	*Pinus canariensis*	-	4	16	20
Aleppo pine	*Pinus halepensis*	1	3	-	4
Italian stone pine	*Pinus pinea*	1	1	-	2
Monterey pine	*Pinus radiata*	1	-	-	1
Scots pine	*Pinus sylvestris*	1	-	-	1
London plane	*Plantanus x hispanica*	1	-	1	2
Lombardy poplar	*Populus nigra*	-	-	1	1
Almond	*Prunis dulcis*	1	3	-	4
Purpleleaf plum	*Prunus cerasifera*	1	-	-	1
Peach	*Prunus persica*	-	-	1	1
Cherry	*Prunus avium*	-	1	-	1
Plum	*Prunus domestica*	-	2	-	2
Pyracantha	*Pyracantha coccinea*	-	1	-	1
Callery pear	*Pyrus calleryana*	1	2	3	6
Evergreen pear	*Pyrus kawakamii*	-	5	2	7
Coast live oak	*Quercus agrifolia*	-	-	2	2
Valley oak	*Quercus lobata*	-	2	3	5
Cork oak	*Quercus suber*	-	-	1	1
Idaho locust	*Robinia idahoensis*	-	2	-	2
California pepper	*Schinus molle*	1	1	1	3
Coast redwood	*Sequoia sempervirens*	-	3	11	14
Chinese tallow	*Triadica sebifera*	-	-	1	1
Siberian elm	*Ulmus pumila*	-	5	-	5
Zelkova	*Zelkova serrata*	-	1	1	2
Total		**25**	**88**	**64**	177

Most of the trees were mature in size. Trunk diameters ranged from 6” (peach #6) to 56” (river red gum #123) for single-trunked trees. The median trunk diameter was 17”. There were 29 trees with more than one trunk. Trees were generally in good to fair condition. Only 14% were in poor condition. A total of 78 or 46% of the trees evaluated qualified as Heritage trees. Heritage status of individual trees is provided in the *Tree Assessment Form* (see Exhibits). Twenty-six of the trees were off-site: 18 in Kottinger Village Park, five along the 4138 Vineyard Ave. fence line, and three just outside the Pleasanton Gardens property line

Canary Island pine was the most common species present, with 20 trees (12% of the population). They were planted around structures and along pedestrian pathways adjacent to Kottinger Village Park (photo 1). The trees ranged in condition from fair to good, some with somewhat thin canopies. The majority of the trees was tall and upright exhibiting good form and structure, and averaged 18” in diameter. Within the group were 15 Heritage trees.

Coast redwood was the second most common species with 14 trees (8% of the population). Averaging 30” in diameter, 11 trees were in good or excellent condition, and 12 were large enough to qualify as Heritage trees (Photo 2). Off-site trees (#62, 63, 66-68, 70, 71, 75 and 76) were located on the east side of Kottinger Place in Kottinger Village Park along the edge of a pedestrian path. Coast redwood #70 was distinctive among the off-site trees, with an extensive wound resulting from a codominant stem failure (Photo 3).

Photo 1: Canary Island pines along path bordering Kottinger Village Park. #55-58 are Heritage trees.

Photo 2: Heritage coast redwood #162 located at 4138 Vineyard Ave.

Photo 3: Heritage coast redwood #70 was located in the park on the outside of a pedestrian path. It had a large trunk wound created when the codominant stem failed several years ago.

Sweetgum, another species present in larger numbers with 11 trees (6% of the population), was planted in small clusters in Pleasanton Gardens and Kottinger Place. Characteristic of the species, they exhibited codominant stems, multiple attachments and poor form. All were in fair condition with one exception; #116 was in good condition. The average diameter was less than 16”, and only two sweetgums were Heritage trees.

The Modesto ash species was represented by nine trees (5% of the population). They were all in fair to poor condition, resulting collectively from poor structure, branch failures, decay and extensive dieback due to repeated infection with anthracnose leaf disease. Located along the perimeter of the project in Kottinger Place and Regalia House, they averaged 23” in diameter; seven were Heritage trees.

Two eucalyptus species were present; river red gum and silver dollar gum. Many were multi-trunked trees, inter-planted in a linear plane along the western perimeter of Kottinger Place and Regalia House. The red river gum was represented by nine trees (5% of the population) and the silver dollar gum by six trees (less than 4% of the population). As a group, eucalyptus ranged from fair to good, and was predominately characterized by poor structure, multiple attachments, branch failure, and wound decay. All eucalyptus trees with the exception of silver dollar gum #109 had Heritage status.

Photo 4: Heritage river red gums were the largest trees on the site. These were located on the northeast corner of Kottinger Place.

Two ornamental pear species were also present: seven evergreen pear (4%) and six Callery pear (3.5%). The evergreen pear was planted in Kottinger Place, and the Callery pear in Pleasanton Gardens. Exhibiting multiple attachments and codominant stems characteristic of both pear species, the collective condition rating ranged from fair to good, with the exception of Callery pear #21 rated poor from extensive dieback. With an average diameter less than 12”, none of the pear trees were large enough for Heritage status.

Photo 5: Catalpas #80 (Heritage) and 81 were in poor condition due to extensive branch dieback and trunk decay. Heritage tree #82 was in fair condition.

Located primarily inside the pedestrian pathway in Kottinger Place, the *Catalpa* species was represented by eight trees (less than 4% of the population). All the trees had a single trunk, with the exception of tree #52, which was multi-trunked. Large in stature (average diameter 22”), all but one of the trees had Heritage status and an average. It was noteworthy that trees #77, 80 and 81 exhibited extensive trunk and branch wounds, dieback and decay (Photo 5).

Eight Raywood ash were present that were in good to fair condition (Photo 6). Several had symptoms of Ash Dieback, a disease caused by the fungus *Botryosphaeria*. All were located along the parking area between Regalia House and the park.

Photo 6. Raywood ash #175-177, 161 (left to right).

Five small mayten trees were planted in the interior at Kottinger Place. Two were multi-trunked (#136, 137), collectively they exhibited decay, dieback, and poor structure, and their condition ranged from poor to fair. The average diameter of the trees was less than 10".

Four Siberian elms were inter-planted with coast redwoods along the eastern pedestrian path in Kottinger Place. A cluster of small Siberian elms (#171) were located off-site adjacent to the Vineyard Ave. parcel in the north-west corner of the site. Two of the four on-site trees had Heritage status; all were in fair condition.

Five semi-mature valley oaks were scattered throughout Pleasanton Gardens, Kottinger Place and Regalia House. Tree #8 was located off-site in the southeast portion of the project. Nearby, trees #1 and 2 were located close together with inter-dependent canopies (Photo 7). These trees had fill soil and pavers place over the root collar many years ago. Two multi-trunked trees (#114, 152) were in fair condition; one suppressed in form and the other with twig dieback and power lines running through the crown. The remaining three were in good condition and all but one was a Heritage tree.

Photo 7. Valley oaks #1 and #2 have grown next to each other and now form one canopy.

Three species were each represented by four trees and included the following:

- Aleppo pine generally in fair to good condition; two heritage trees on the west side (#90, 113) and two off-site trees on the east side, one with heritage status (#61). Tree #90 was impressively large, but had a significant structural defect that compromises its structural stability (Photo 8).
- Almond in a linear planting at Regalia House (#149-151,154). Trees had poor form and structure with an average diameter of nine inches.
- California black walnut (#166-169) in linear planting on the west side of Vineyard Ave. with three trees off-site. Two trees were multi-trunked and two had heritage status. Tree #167 was in poor condition with poor form and two dead stems. The other three were in fair condition with codominant stems and multiple attachments.

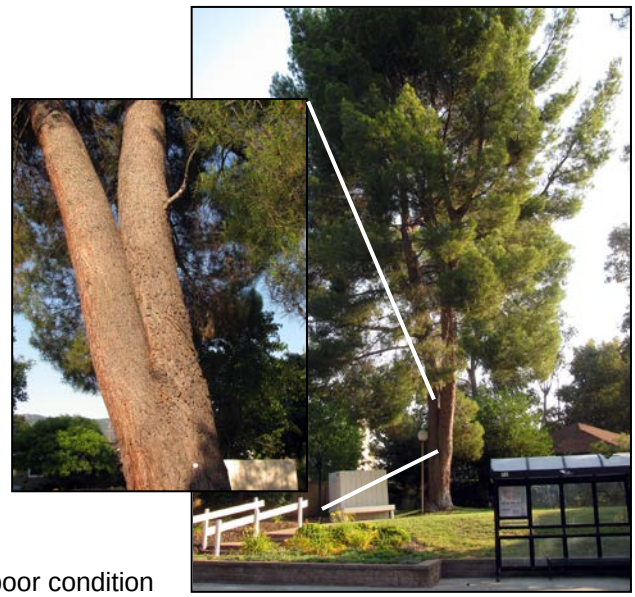


Photo 8. Aleppo pine #90 had codominant stems with included bark (see inset). This is a structurally weak condition that is likely to result in tree failure. A cable had been installed between the two stems to provide some support.

Three species were represented by two trees each and included the following:

- California pepper at Kottinger Place; one each in good (#105), fair (#107) and poor (#106) condition. The trees had heritage status, the largest of which was in poor condition with extensive trunk and branch decay.
- Glossy privet were small, multi-trunked trees. One was located in Kottinger Place (#92), and one in Pleasanton Gardens (#25); #27 was a hedge of 30 stems located off-site on the fence line.
- Southern magnolia. Two planted in Pleasanton Gardens (#18, 33) had heritage status and were in good condition and #121 in Kottinger Place was fair with a thin crown and dieback.

Twelve species were each represented by two trees. Trees of note included:

- Coast live oak #164 in good condition, albeit with codominant trunks, and #165 in excellent condition were both heritage trees (Photo 9). These are naturally-occurring trees native to Pleasanton. The canopies extended to the ground as is typical of the species. This form shades the root system and helps the trees survive the long dry summer. They were located at the west end of 4138 Vineyard Ave.
- Ginkgo #7 was a good young tree in Pleasanton Gardens (Photo 10), and moderate-sized #163 in the Vineyard Ave. was suppressed in form and in fair condition.
- Zelkova #51 was in fair condition because of multiple branch attachments and presence of a girdling root. Zelkova #132 was in good condition.

Photo 9. The canopy of Heritage coast live oaks #164 and 165 occupied the west end of the Vineyard Ave. property.

Twenty three species were represented by one tree each. Both Canary Island date palm #133 and the cork oak #56 were heritage trees (noted with an asterisk) in good condition. In Pleasanton Gardens, two small trees in excellent condition were Colorado spruce #28 with good form (Photo 11), and crape myrtle #29 with a full crown and multiple attachments at the base.

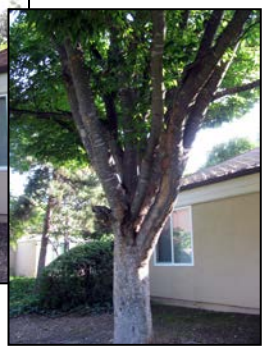


Photo 10 (left). Zelkova with multiple branch attachments (inset).

Photo 11 (right). Colorado spruce with good form and health.

Suitability for Preservation

Before evaluating the impacts that will occur during development, it is important to consider the quality of the tree resource itself, and the potential for individual trees to function well over an extended length of time. Trees that are preserved on development sites must be carefully selected to make sure that they may survive development impacts, adapt to a new environment and perform well in the landscape.

Our goal is to identify trees that have the potential for long-term health, structural stability and longevity. For trees growing in open fields, away from areas where people and property are present, structural defects and/or poor health presents a low risk of damage or injury if they fail. However, we must be concerned about safety in use areas. Therefore, where development encroaches into existing plantings, we must consider their structural stability as well as their potential to grow and thrive in a new environment. Where development will not occur, the normal life cycles of decline, structural failure and death should be allowed to continue.

Evaluation of suitability for preservation considers several factors:

- **Tree health**
  Healthy, vigorous trees are better able to tolerate impacts such as root injury, demolition of existing structures, changes in soil grade and moisture, and soil compaction than are non-vigorous trees.

- **Structural integrity**
  Trees with significant amounts of wood decay and other structural defects that cannot be corrected are likely to fail. Such trees should not be preserved in areas where damage to people or property is likely.

- **Species response**
  There is a wide variation in the response of individual species to construction impacts and changes in the environment. In general, coast redwoods are relatively tolerant of construction impacts and site changes while magnolia is intolerant of site disturbance.

- **Tree age and longevity**
  Old trees, while having significant emotional and aesthetic appeal, have limited physiological capacity to adjust to an altered environment. Young trees in good condition are better able to generate new tissue and respond to change.

- **Species invasiveness**
  Species that spread across a site and displace desired vegetation are not always appropriate for retention. This is particularly true when indigenous species are displaced. The California Invasive Plant Inventory Database (http://www.cal-ipc.org/paf/) maintains a list and invasive ratings of plant species in California. Pleasanton is part of the Central West Floristic Province. Blackwood acacia is listed with a *moderate* invasiveness rating, and red river gum, purple-leafed plum and pyracantha have a *limited* invasiveness, rating.

Each tree was rated for suitability for preservation based upon its age, health, structural condition and ability to safely coexist within a development environment (see *Tree Assessment* in Exhibits). We consider trees with good suitability for preservation to be the best candidates for preservation. We do not recommend retention of trees with poor suitability for preservation in areas where people or property will be present. Retention of trees with moderate suitability for preservation depends upon the intensity of proposed site changes.

Table 2: Trees Suitability for preservation

High	These are trees with good health and structural stability that have the potential for longevity at the site. Forty-five trees were in this category (Table 3).
Moderate	Trees in this category have fair health and/or structural defects that may be abated with treatment. These trees require more intense management and monitoring, and may have shorter life-spans than those in the "high" category. Fifty-eight trees were in this category.
Low	Trees in this category are in poor health or have significant defects in structure that cannot be abated with treatment. These trees can be expected to decline regardless of management. The species or individual tree may possess either characteristics that are undesirable in landscape settings or be unsuited for use areas. Seventy-four trees had low suitability for preservation.

Evaluation of Impacts and Recommendations for Preservation

Appropriate tree retention develops a practical match between the location and intensity of construction activities and the quality and health of trees. The *Tree Assessment (Exhibits)* was the reference point for tree condition and quality. Potential impacts from redevelopment of the site were evaluated using the Site Plan provided by Dahlin Group. This plan is conceptual in nature and identifies general layout of new homes, landscape, ad parking areas. No specific development information regarding site grading, utilities, or construction details were available at the time of this report. Trees have yet to be accurately located by engineer survey.

The plans indicated that the existing buildings, parking areas and landscapes will be demolished and new facilities will be constructed. Because of the intensity of the site changes, most trees on the site will be affected. The primarily opportunities for tree preservation are around the perimeter of the project. In most cases, grading or other excavation for construction is expected to be close to trees. It will be necessary to accurately locate the trunk of nearby trees to adequately assess potential tree impacts and design for tree preservation (Photo 12).

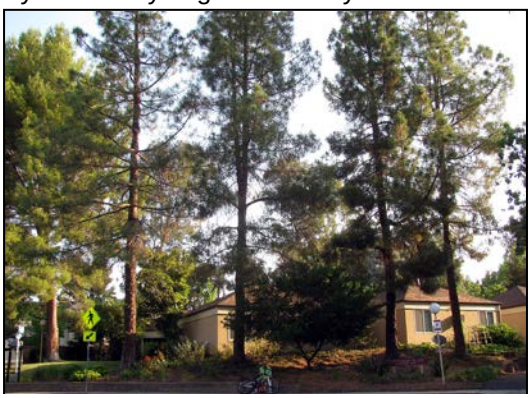


Photo 12. Canary Island pines #83-86 are located at the Kottenger Dr. entrance to Kottinger Place. They are good candidates for retention. They are in the "possibly preserve" category (Table 4). We recommend accurately locating the trunks and designing for their preservation.

Based on the information available to date, it appears that at least 132 trees will be removed, 49 of which are Heritage trees (Table 4). Pending having accurate trunk locations, we think that 21 trees can be preserved, and another 24 could likely be preserved with some design accommodation. Tree-by-tree disposition is provided in Table 4 and on the Tree Disposition Plan (Exhibits).

Table 3: Trees with High Suitability for Preservation
Kottinger Senior Housing Project, Pleasanton, CA

Tree #	Species	Diameter	Heritage?
1	Valley oak	20	Yes
2	Valley oak	20	Yes
7	Ginkgo	7	No
8	Valley oak	18	Yes
10	Coast redwood	25	Yes
12	Coast redwood	25	Yes
18	Southern magnolia	19	Yes
28	Colorado spruce	13	No
29	Crape myrtle	8,6,6,5,5	No
33	Southern magnolia	18	Yes
35	Coast redwood	39	Yes
36	Hackberry	11	No
39	Strawberry tree	7,5,5,5,5,5,4	No
40	Canary Island pine	18	Yes
42	Canary Island pine	17	No
48	Coast redwood	35	Yes
54	Canary Island pine	15	No
56	Cork oak	18	Yes
57	Canary Island pine	18	Yes
58	Canary Island pine	18	Yes
62	Coast redwood	16	No
63	Coast redwood	16	No
66	Coast redwood	34	Yes
67	Coast redwood	34	Yes
68	Coast redwood	43	Yes
72	Canary Island pine	18	Yes
74	Canary Island pine	20	Yes
83	Canary Island pine	19	Yes
84	Canary Island pine	21	Yes
86	Canary Island pine	24	Yes
102	Silver dollar gum	28	Yes
133	Canary Island date palm	49	Yes
138	London plane	25	Yes
141	Canary Island pine	18	Yes
142	Canary Island pine	22	Yes
143	Canary Island pine	17	No
144	Canary Island pine	18	Yes
145	Canary Island pine	13	No
162	Coast redwood	38	Yes
164	Coast live oak	35	Yes
165	Coast live oak	24	Yes
172	Raywood ash	16	No
172	Raywood ash	17	No
174	Raywood ash	17	No
175	Raywood ash	17	No

Table 4: Summary of Tree Disposition: Number of trees estimated to be removed and preserved based on current site development plans.

Heritage tree?	Preserve	Possibly Preserve	Remove
No	7	9	83
Yes	14	15	49
Total	21	24	132

Of the 26 off-site trees, 16 will be preserved; seven possibly preserved; and three removed. Three trees that will be removed are Raywood ash along the parking lot between Regalia House and the park. These trees are included in Tables 4 and 5.

Preservation of the trees is predicated on the construction impacts being within the tolerances of the trees and on the implementation of specific recommendations in the *Tree Preservation Guidelines.* Specific tree root and crown impacts near the limits of grading should be evaluated when construction plans and accurate trunk locations are available. Depending on the extent of impact, additional trees may be recommended for removal.

Table 5: Preliminary Assessment of Tree Preservation and Removal Kottinger Senior Housing Project, Pleasanton, CA

Tree #	Species	Trunk Diameter (in.)	Heritage ?	Suitability for Preservation	Disposition
1	Valley oak	20	Yes	High	Preserve
2	Valley oak	20	Yes	High	Preserve
3	Sweetgum	19	Yes	Moderate	Remove
4	Sweetgum	20	Yes	Moderate	Remove
5	Sweetgum	17	No	Moderate	Remove
6	Peach	6	No	Moderate	Remove
7	Ginkgo	7	No	High	Preserve
8	Valley oak	18	Yes	High	Preserve
9	Arizona cypress	9	No	Moderate	Possibly preserve
10	Coast redwood	25	Yes	High	Remove
11	Incense cedar	11	No	Moderate	Remove
12	Coast redwood	25	Yes	High	Remove
13	Callery pear	13	No	Moderate	Remove
14	Callery pear	11	No	Moderate	Remove
15	Sweetgum	14	No	Low	Remove
16	Sweetgum	14	No	Low	Remove
17	Cherry	10,7,5	No	Moderate	Remove
18	Southern magnolia	19	Yes	High	Remove
19	Callery pear	14	No	Moderate	Remove
20	Desert willow	10	No	Low	Remove
21	Callery pear	10	No	Low	Remove
22	Callery pear	15	No	Low	Remove
23	Callery pear	15	No	Moderate	Remove
24	Monterey pine	8,8	No	Low	Remove
25	Glossy privet	6,5,3	No	Low	Remove

Tree #	Species	Trunk Diameter (in.)	Heritage ?	Suitability for Preservation	Disposition
26	English walnut	14,11	Yes	Moderate	Preserve
27	Glossy privet	multi-stem	No	Low	Preserve
28	Colorado spruce	13	No	High	Remove
29	Crape myrtle	8,6,6,5,5	No	High	Remove
30	European white birch	6	No	Low	Remove
31	European white birch	7	No	Low	Remove
32	Purple-leafed plum	6,5,4,4,3	No	Low	Remove
33	Southern magnolia	18	Yes	High	Remove
34	Chinese tallow	12	No	Moderate	Remove
35	Coast redwood	39	Yes	High	Possibly preserve
36	Hackberry	11	No	High	Remove
37	Modesto ash	21	Yes	Moderate	Remove
38	Modesto ash	21	Yes	Moderate	Possibly preserve
39	Stawberry tree	7,5,5,5,5,5,4	No	High	Remove
40	Canary Island pine	18	Yes	High	Remove
41	Blackwood acacia	9,7,7,4	No	Low	Remove
42	Canary Island pine	17	No	High	Remove
43	Raywood ash	14	No	Low	Preserve
44	Modesto ash	14	No	Low	Preserve
45	Modesto ash	21	Yes	Low	Preserve
46	Idaho locust	11	No	Low	Possibly preserve
47	Modesto ash	20	Yes	Low	Remove
48	Coast redwood	35	Yes	High	Possibly preserve
49	Pyracantha	8,6,5	No	Low	Remove
50	Scots pine	10	No	Low	Remove
51	Zelkova	15	No	Moderate	Remove
52	Catalpa	15,10,8,6	Yes	Moderate	Remove
53	Catalpa	18	Yes	Moderate	Remove
54	Canary Island pine	15	No	High	Possibly preserve
55	Canary Island pine	18	Yes	Moderate	Possibly preserve
56	Cork oak	18	Yes	High	Remove
57	Canary Island pine	18	Yes	High	Remove
58	Canary Island pine	18	Yes	High	Remove
59	Idaho locust	11	No	Low	Preserve
60	Aleppo	8	No	Low	Remove
61	Aleppo	29	Yes	Low	Preserve
62	Coast redwood	16	No	High	Preserve
63	Coast redwood	16	No	High	Preserve
64	Siberian elm	18	Yes	Low	Remove
65	Siberian elm	10	No	Moderate	Remove
66	Coast redwood	34	Yes	High	Preserve
67	Coast redwood	34	Yes	High	Preserve
68	Coast redwood	43	Yes	High	Preserve
69	Siberian elm	22	Yes	Low	Remove
70	Coast redwood	35	Yes	Moderate	Preserve

Tree #	Species	Trunk Diameter (in.)	Heritage ?	Suitability for Preservation	Disposition
71	Coast redwood	39	Yes	Moderate	Preserve
72	Canary Island pine	18	Yes	High	Remove
73	Canary Island pine	21	Yes	Moderate	Remove
74	Canary Island pine	20	Yes	High	Remove
75	Coast redwood	22	Yes	Low	Preserve
76	Coast redwood	25	Yes	Moderate	Preserve
77	Catalpa	24	Yes	Low	Remove
78	Catalpa	18	Yes	Moderate	Remove
79	Catalpa	27	Yes	Moderate	Possibly preserve
80	Catalpa	21	Yes	Low	Remove
81	Catalpa	15	No	Low	Remove
82	Catalpa	27	Yes	Moderate	Possibly preserve
83	Canary Island pine	19	Yes	High	Possibly preserve
84	Canary Island pine	21	Yes	High	Possibly preserve
85	Canary Island pine	20	Yes	Moderate	Possibly preserve
86	Canary Island pine	24	Yes	High	Possibly preserve
87	Bronze loquat	6,5,4,3	No	Low	Remove
88	Evergreen pear	7	No	Moderate	Remove
89	Evergreen pear	6	No	Moderate	Remove
90	Aleppo	35	Yes	Low	Remove
91	Plum	7	No	Low	Remove
92	Glossy privet	6,6,3,3	No	Moderate	Remove
93	Evergreen pear	11	No	Moderate	Remove
94	River red gum	23	Yes	Moderate	Remove
95	River red gum	21	Yes	Low	Remove
96	River red gum	20,12	Yes	Low	Remove
97	Cabbage tree	6	No	Low	Remove
98	Evergreen pear	11	No	Moderate	Remove
99	Evergreen pear	13	No	Low	Remove
100	Evergreen pear	14	No	Low	Remove
101	Silver dollar gum	32	Yes	Moderate	Remove
102	Silver dollar gum	28	Yes	High	Remove
103	Silver dollar gum	30	Yes	Low	Remove
104	Silver dollar gum	14,12,12,12, 10,9,9,7,7	Yes	Low	Remove
105	California pepper	11	No	Moderate	Remove
106	California pepper	18	Yes	Low	Remove
107	California pepper	15	No	Moderate	Remove
108	River red gum	32	Yes	Low	Remove
109	Silver dollar gum	10	No	Low	Remove
110	Italian stone pine	15	No	Low	Remove
111	Silver dollar gum	18,15,12,8	Yes	Low	Remove
112	Canary Island pine	12	No	Moderate	Remove
113	Aleppo	23	Yes	Moderate	Remove
114	Valley oak	10,5	No	Low	Remove
115	Sweetgum	14	No	Low	Remove
116	Sweetgum	17	No	Moderate	Remove

Tree #	Species	Trunk Diameter (in.)	Heritage ?	Suitability for Preservation	Disposition
117	Sweetgum	12	No	Moderate	Remove
118	Sweetgum	13	No	Low	Remove
119	Sweetgum	15	No	Low	Remove
120	Sweetgum	16	No	Low	Remove
121	Southern magnolia	15	No	Low	Remove
122	English walnut	7,7	No	Low	Remove
123	River red gum	56	Yes	Moderate	Remove
124	Bailey acacia	9	No	Low	Remove
125	Italian stone pine	11	No	Low	Remove
126	River red gum	18	Yes	Moderate	Remove
127	Lombardy poplar	11,10,10,10	No	Moderate	Remove
128	Silver maple	8	No	Moderate	Remove
129	Evergreen pear	10	No	Moderate	Remove
130	Mayten	7	No	Low	Remove
131	Mayten	8	No	Low	Remove
132	Zelkova	16	No	Moderate	Remove
133	Canary Island palm	49	Yes	High	Remove
134	Siberian elm	6,5	No	Moderate	Remove
135	Mayten	10	No	Low	Remove
136	Mayten	8,3,3	No	Low	Remove
137	Mayten	9,7	No	Low	Remove
138	London plane	25	Yes	High	Remove
139	London plane	14	No	Low	Remove
140	Canary Island pine	19	Yes	Moderate	Remove
141	Canary Island pine	18	Yes	High	Remove
142	Canary Island pine	22	Yes	High	Remove
143	Canary Island pine	17	No	High	Remove
144	Canary Island pine	18	Yes	High	Remove
145	Canary Island pine	13	No	High	Remove
146	River red gum	32,26,26,24	Yes	Moderate	Remove
147	Plum	6,6,4,4	No	Low	Remove
148	River red gum	24	Yes	Low	Remove
149	Almond	8	No	Low	Remove
150	Almond	10	No	Low	Remove
151	Almond	7	No	Low	Remove
152	Valley oak	10,8	Yes	Moderate	Remove
153	River red gum	12,11,10,9	Yes	Moderate	Remove
154	Almond	12	No	Low	Remove
155	Modesto ash	17	No	Low	Remove
156	Modesto ash	30	Yes	Low	Remove
157	Hollywood juniper	15	No	Low	Remove
158	Hollywood juniper	11	No	Low	Remove
159	Modesto ash	31	Yes	Moderate	Remove
160	Modesto ash	32	Yes	Low	Remove
161	Raywood ash	16	No	Moderate	Remove
162	Coast redwood	38	Yes	High	Possibly preserve
163	Ginkgo	12	No	Moderate	Remove
164	Coast live oak	35	Yes	High	Possibly preserve

Tree #	Species	Trunk Diameter (in.)	Heritage ?	Suitability for Preservation	Disposition
165	Coast live oak	24	Yes	High	Possibly preserve
166	California black walnut	8,6,6,6	No	Low	Possibly preserve
167	California black walnut	14,12,12	Yes	Low	Possibly preserve
168	California black walnut	16	No	Low	Possibly preserve
169	California black walnut	24	Yes	Low	Possibly preserve
170	Avocado	12	No	Moderate	Possibly preserve
171	Siberian elm	14,14,13,12,12,12,12	Yes	Low	Preserve
172	Raywood ash	17	No	High	Remove
173	Raywood ash	16	No	High	Remove
174	Raywood ash	17	No	High	Remove
175	Raywood ash	17	No	High	Possibly preserve
176	Raywood ash	17	No	Moderate	Possibly preserve
177	Raywood ash	17	No	Moderate	Possibly preserve

Tree Preservation Guidelines

The goal of tree preservation is not merely tree survival during development but maintenance of tree health and beauty for many years. Trees retained on sites that are either subject to extensive injury during construction or are inadequately maintained become a liability rather than an asset. The response of individual trees depends on the amount of excavation and grading, care with which demolition is undertaken, and construction methods. Coordinating any construction activity inside the **TREE PROTECTION ZONE** can minimize these impacts.

The following recommendations will help reduce impacts to trees from development and maintain and improve their health and vitality through the clearing, grading and construction phases.

Design recommendations

1. Accurately locate trees currently designated as “preserve” and “possibly preserve”.

2. Modify site design to preserve as many trees in the “possibly preserve” category as possible.

3. Any changes to the plans affecting the trees should be reviewed by the consulting arborist with regard to tree impacts. These include, but are not limited to, site plans, improvement plans, utility and drainage plans, grading plans, landscape and irrigation plans, and demolition plans.

4. **TREE PROTECTION ZONE** shall be established around each tree. No grading, excavation, construction or storage of materials shall occur within that zone. No underground services including utilities, sub-drains, water or sewer shall be placed in the **TREE PROTECTION ZONE**. Spoil from trench, footing, utility or other excavation shall not be placed within the **TREE PROTECTION ZONE**, either temporarily nor permanently. The limits of the **TREE PROTECTION ZONE** will be adjusted following review of grading and

construction plans. For design purposes, the **TREE PROTECTION ZONE** trees shall be defined as the tree dripline.

5. **Tree Preservation Notes**, prepared by the Consulting Arborist, should be included on all plans.

6. Any herbicides placed under paving materials must be safe for use around trees and labeled for that use.

7. Irrigation systems must be designed so that no trenching that severs roots larger than 1" diameter will occur within the **TREE PROTECTION ZONE**.

8. As trees withdraw water from the soil, expansive soils may shrink within the root area. Therefore, foundations, footings and pavements on expansive soils near trees should be designed to withstand differential displacement.

Pre-construction treatments and recommendations

1. The construction superintendent shall meet with the Consulting Arborist before beginning work to discuss work procedures and tree protection.

2. Fence all trees to be retained to completely enclose the **TREE PROTECTION ZONE** prior to demolition, grubbing or grading. Fences shall be 6 ft. chain link or equivalent as approved by the City. Fences are to remain until all grading and construction is completed. Where demolition must occur close to trees, such as removing curb and pavement, install trunk protection devices such as winding silt sock wattling around trunks or stacking hay bales around tree trunks.

3. Prune trees to be preserved to clean the crown of dead branches 2" and larger in diameter, raise canopies as needed for construction activities, and reduce weight on weak attachments. All pruning shall be done by a State of California Licensed Tree Contractor (C61/D49). All pruning shall be done by Certified Arborist or Certified Tree Worker in accordance with the Best Management Practices for Pruning (International Society of Arboriculture, 2002) and adhere to the most recent editions of the American National Standard for Tree Care Operations (Z133.1) and Pruning (A300). The Consulting Arborist will provide pruning specifications prior to site demolition.

4. Tree(s) to be removed that have branches extending into the canopy of tree(s) to remain shall be removed by a Certified Arborist or Certified Tree Worker and not by the demolition contractor. The Certified Arborist or Certified Tree Worker shall remove the trees in a manner that causes no damage to the tree(s) and understory to remain.

Recommendations for tree protection during construction

1. Any approved grading, construction, demolition or other work within the **TREE PROTECTION ZONE** should be monitored by the Consulting Arborist.

2. All contractors shall conduct operations in a manner that will prevent damage to trees to be preserved.

3. Tree protection devices are to remain until all site work has been completed within the work are. Fences or other protection devices may not be relocated or removed without permission of the Project Arborist.

4. Construction trailers, traffic and storage areas must remain outside **TREE PROTECTION ZONE** at all times.

5. Any root pruning required for construction purposes shall receive the prior approval of and be supervised by the Project Arborist. Roots should be cut with a saw to provide a flat and smooth cut. Removal of roots larger than 2" in diameter should be avoided.

6. If roots 2" and greater in diameter are encountered and during site work must be cut to complete the construction, the Project Arborist must be consulted to evaluate effects on the health and stability of the tree and recommend treatment.

7. All grading within the dripline of trees shall be done using the smallest equipment possible. The equipment shall operate perpendicular to the tree and operate from outside the **TREE PROTECTION ZONE**. Any modifications must be approved and monitored by the Consulting Arborist.

8. Redwoods require regular, frequent irrigation. If irrigation systems are not operable during construction, provisions must be made to provide adequate irrigation by other means. Supplemental irrigation shall be applied as determined by the Consulting Arborist.

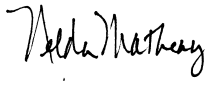
9. If injury should occur to any tree during construction, it should be evaluated as soon as possible by the Consulting Arborist so that appropriate treatments can be applied.

10. No excess soil, chemicals, debris, equipment or other materials shall be dumped or stored within the **TREE PROTECTION ZONE**.

11. Any additional tree pruning needed for clearance during construction must be performed by a Certified Arborist and not by construction personnel.

Maintenance of impacted trees
Trees preserved at the Kottinger Senior Housing site will experience a different physical environment than previously. As a result, tree health and structural stability should be monitored. Occasional pruning, fertilization, mulch, pest management, replanting and irrigation may be required. In addition, monitoring tree health and structural stability following construction must be made a priority. As trees age, the likelihood of failure of branches or entire trees increases. Therefore, it is recommended that the property owner have the trees inspected annually for hazard potential.

HortScience, Inc.



Nelda Matheny
Register Consulting Arborist #243
Board Certified Master Arborist #WE-0195B

Exhibits

Tree Assessment Map

Tree Disposition Maps

Tree Assessment

HORT SCIENCE

Tree Assessment Map

Kottinger Senior Housing Project

Pleasanton, CA

Prepared for:
MidPen Housing Corporation
Foster City, CA

June 2013

No Scale

Notes:
Site plan provided by:
The Dahlin Group

Numbered tree locations
are approximate.

Refer to HortScience Tree Assessment for
description of the trees

HORT SCIENCE

325 Ray Street
Pleasanton, CA 94566
Phone 925.484.0211
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www.hortscience.com

Tree Dispostion Plan

Kottinger Senior Housing Project Southern Section

Pleasanton, CA

Prepared for:
MidPen Housing Corporation
Foster City, CA

July 3, 2013

No Scale

Notes:

Site plan provided by:
The Dahlin Group

Numbered tree locations
are approximate.

Refer to HortScience Tree Assessment for
description of the trees.

55 = Trees to preserve
55 = Trees to possibly preserve
55 = Trees to be removed
▲ = Heritage trees

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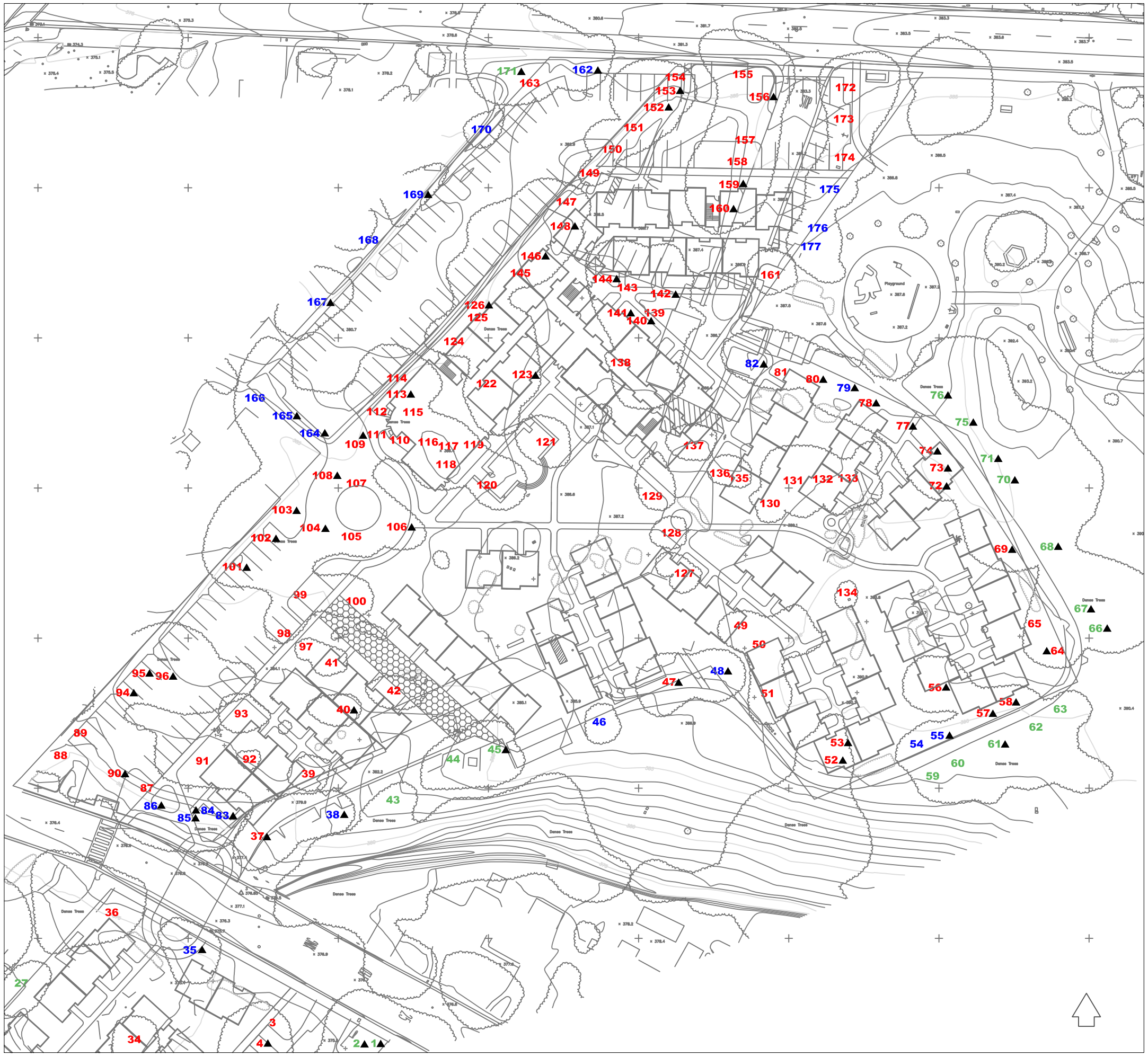

Tree Dispostion Plan

Kottinger Senior Housing Project Northern Section

Pleasanton, CA

Prepared for:
MidPen Housing Corporation
Foster City, CA

July 3, 2013

No Scale

Notes:

Site plan provided by:
The Dahlin Group

Numbered tree locations
are approximate.

Refer to HortScience Tree Assessment for
description of the trees.

55 = Trees to preserve
55 = Trees to possibly preserve
55 = Trees to be removed
▲ = Heritage trees

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Tree Assessment

Kottinger Senior Housing Project
Pleasanton, CA
June 2013

TREE No.	SPECIES	TRUNK DIAMETER (inches)	HERITAGE TREE?	CONDITION 1=Poor 5=Excellent	SUITABILITY FOR PRESERVATIO	COMMENTS
1	Valley oak	20	Yes	4	High	One-sided to N.; multiple attachments at 20'; fill and paving stones over root collar.
2	Valley oak	20	Yes	4	High	Multiple attachments at 10'; crown to S.; fill and paving stone over root collar; codominant form with #1.
3	Sweetgum	19	Yes	3	Moderate	Codominant at 8'; topped; very large surface roots.
4	Sweetgum	20	Yes	3	Moderate	Multiple attachments at 10'; topped; small cavity on W.
5	Sweetgum	17	No	3	Moderate	Topped; mounded at base; large surface roots.
6	Peach	6	No	4	Moderate	Multiple attachments at 5'.
7	Ginkgo	7	No	4	High	Good young tree.
8	Valley oak	18	Yes	4	High	Off-site; no tag; base engulfed in ivy; full crown.
9	Arizona cypress	9	No	3	Moderate	Very high narrow crown.
10	Coast redwood	25	Yes	4	High	Crown lifted to 25'.
11	Incense cedar	11	No	3	Moderate	Crown lifted to 12'; thin crown.
12	Coast redwood	25	Yes	4	High	Crown lifted to 12'; a bit thin; minor tip burn.
13	Callery pear	13	No	4	Moderate	Multiple attachments at 8' with narrow attachment; full crown.
14	Callery pear	11	No	4	Moderate	Multiple attachments at 8';
15	Sweetgum	14	No	3	Low	Codominant at 8' with very narrow attachment.
16	Sweetgum	14	No	3	Low	Codominant at 5' with very narrow attachment and included bark.
17	Cherry	10,7,5	No	3	Moderate	Multiple attachments at 3'; trunk decay.
18	Southern	19	Yes	4	High	Codominant at 6'; nice full crown.
19	Callery pear	14	No	4	Moderate	Multiple attachments at 10' with narrow attachment.

Tree Assessment

Kottinger Senior Housing Project
Pleasanton, CA
June 2013

TREE No.	SPECIES	TRUNK DIAMETER (inches)	HERITAGE TREE?	CONDITION 1=Poor 5=Excellent	SUITABILITY FOR PRESERVATIO	COMMENTS
20	Desert willow	10	No	3	Low	Extensive cracks in trunk and branches; good form.
21	Callery pear	10	No	2	Low	Extensive dieback.
22	Callery pear	15	No	3	Low	Leaning to E.; multiple attachments at 6'; bark checking at base.
23	Callery pear	15	No	3	Moderate	Multiple attachments at 6'; topped; full crown.
24	Monterey pine	8,8	No	1	Low	Little live foliage.
25	Glossy privet	6,5,3	No	2	Low	Multiple attachments at 1'; poor form.
26	English walnut	14,11	Yes	3	Moderate	Off-site; no tag; codominant at 5'; full crown.
27	Glossy privet	multi-stem	No	3	Low	Off-site; no tag; hedge of 30 stems 6" and smaller at fence line.
28	Colorado spruce	13	No	5	High	Nice tree; good form.
29	Crape myrtle	8,6,6,5,5	No	5	High	Multiple attachments at base; full crown; excellent health.
30	European white birch	6	No	1	Low	Topped; extensive dieback.
31	European white birch	7	No	2	Low	Topped; dieback.
32	Purple-leafed plum	6,5,4,4,3	No	2	Low	Multiple attachments at 4'; extensive trunk decay.
33	Southern	18	Yes	4	High	Full crown; small cavity on S.
34	Chinese tallow	12	No	4	Moderate	Codominant at 7'; interior deadwood; surface roots.
35	Coast redwood	39	Yes	5	High	Excellent health and structure.
36	Hackberry	11	No	4	High	Good form; minor dieback.
37	Modesto ash	21	Yes	3	Moderate	Codominant at 5'; stem to N. is starting to separate; thinning crown.
38	Modesto ash	21	Yes	3	Moderate	Multiple attachments at 5'; branch tore out on E.; thinning crown with dieback.

Tree Assessment

Kottinger Senior Housing Project
Pleasanton, CA
June 2013

TREE No.	SPECIES	TRUNK DIAMETER (inches)	HERITAGE TREE?	CONDITION 1=Poor 5=Excellent	SUITABILITY FOR PRESERVATIO	COMMENTS
39	Strawberry tree	7,5,5,5,5,5,4	No	4	High	Multiple attachments at base; full crown.
40	Canary Island pine	18	Yes	4	High	Tall narrow form.
41	Blackwood acacia	9,7,7,4	No	3	Low	At edge of building; multiple attachments at 2'; branches twist around each other.
42	Canary Island pine	17	No	4	High	Tall narrow form.
43	Raywood ash	14	No	3	Low	Poorly pruned; one upright stem remains.
44	Modesto ash	14	No	3	Low	Codominant at 6'; extensive dieback; trunk leans S.
45	Modesto ash	21	Yes	3	Low	Multiple attachments at 6'; extensive dieback.
46	Idaho locust	11	No	3	Low	Very thin; enlarged basal flare.
47	Modesto ash	20	Yes	2	Low	Trunk decay from base into upright stems; full crown.
48	Coast redwood	35	Yes	5	High	Excellent health and structure.
49	Pyracantha	8,6,5	No	3	Low	Poor form; dieback.
50	Scots pine	10	No	2	Low	Tall narrow form; leans N.
51	Zelkova	15	No	3	Moderate	Multiple attachments at 6'; nice full crown; girdling root.
52	Catalpa	15,10,8,6	Yes	3	Moderate	Multiple attachments at base; root pruned?
53	Catalpa	18	Yes	4	Moderate	Good upright form; decay in roots; root pruned?
54	Canary Island pine	15	No	4	High	Good upright form; a bit thin.
55	Canary Island pine	18	Yes	4	Moderate	Good upright form; a bit thin; one-sided to E.
56	Cork oak	18	Yes	4	High	Good form and structure.
57	Canary Island pine	18	Yes	4	High	Good upright form; a bit thin.
58	Canary Island pine	18	Yes	4	High	Good upright form; a bit thin.

Tree Assessment

Kottinger Senior Housing Project
Pleasanton, CA
June 2013

TREE No.	SPECIES	TRUNK DIAMETER (inches)	HERITAGE TREE?	CONDITION 1=Poor 5=Excellent	SUITABILITY FOR PRESERVATIO	COMMENTS
59	Idaho locust	11	No	3	Low	Off-site; edge of existing path; multiple attachments at 4' with decay in point of attachment.
60	Aleppo	8	No	2	Low	Off-site; edge of existing path; failing at base.
61	Aleppo	29	Yes	3	Low	Off-site; edge of existing path; codominant at 15'; heavy low lateral limb.
62	Coast redwood	16	No	5	High	Off-site; edge of existing path; excellent health and structure.
63	Coast redwood	16	No	5	High	Off-site; edge of existing path; excellent health and structure.
64	Siberian elm	18	Yes	3	Low	Codominant at 6'; twig dieback.
65	Siberian elm	10	No	3	Moderate	Codominant at 7'; base at edge of building.
66	Coast redwood	34	Yes	5	High	Off-site; edge of existing path; excellent health and structure.
67	Coast redwood	34	Yes	5	High	Off-site; edge of existing path; excellent health and structure.
68	Coast redwood	43	Yes	4	High	Off-site; edge of existing path; excellent health; codominant high in crown.
69	Siberian elm	22	Yes	3	Low	Multiple attachments at 12'; full heavy crown; extensive surface roots with decay.
70	Coast redwood	35	Yes	3	Moderate	Off-site; edge of existing path; extensive wound from codominant failure.
71	Coast redwood	39	Yes	4	Moderate	Off-site; edge of existing path; codominant at 18'; otherwise good.
72	Canary Island pine	18	Yes	4	High	Good form; thin crown.
73	Canary Island pine	21	Yes	3	Moderate	Codominant high in crown.

Tree Assessment

Kottinger Senior Housing Project
Pleasanton, CA
June 2013

TREE No.	SPECIES	TRUNK DIAMETER (inches)	HERITAGE TREE?	CONDITION 1=Poor 5=Excellent	SUITABILITY FOR PRESERVATIO	COMMENTS
74	Canary Island pine	20	Yes	4	High	Good upright form.
75	Coast redwood	22	Yes	3	Low	Off-site; edge of existing path; very thin.
76	Coast redwood	25	Yes	3	Moderate	Off-site; edge of existing path; corrected form; thin crown.
77	Catalpa	24	Yes	2	Low	Extensive trunk and branch wounds; full crown.
78	Catalpa	18	Yes	3	Moderate	Narrow crown; trunk wound.
79	Catalpa	27	Yes	3	Moderate	Heavy low lateral; dieback.
80	Catalpa	21	Yes	2	Low	Extensive trunk and branch decay.
81	Catalpa	15	No	2	Low	Extensive dieback.
82	Catalpa	27	Yes	3	Moderate	Multiple attachments at 12'; full crown; small trunk wound.
83	Canary Island pine	19	Yes	4	High	Good form and structure; a bit thin.
84	Canary Island pine	21	Yes	4	High	Heavy low lateral; otherwise good.
85	Canary Island pine	20	Yes	3	Moderate	Codominant high in crown.
86	Canary Island pine	24	Yes	4	High	Good form; a bit thin.
87	Bronze loquat	6,5,4,3	No	3	Low	Multiple attachments at base; decay in 3" stem.
88	Evergreen pear	7	No	3	Moderate	Suppressed; thin crown.
89	Evergreen pear	6	No	4	Moderate	Ok form.
90	Aleppo	35	Yes	3	Low	Codominant at 8' with very narrow attachment; cabled; stem to S. heavy weight over bus stop.
91	Plum	7	No	3	Low	Crown bows away from building.
92	Glossy privet	6,6,3,3	No	4	Moderate	Multiple attachments at 2'; good young tree.
93	Evergreen pear	11	No	4	Moderate	Codominant at 6'; full crown.
94	River red gum	23	Yes	4	Moderate	Good form; lerp psyllid.
95	River red gum	21	Yes	2	Low	Poor form and structure; topped; lerp psyllid.
96	River red gum	20,12	Yes	3	Low	History of branch failure; lerp psyllid.

Tree Assessment

Kottinger Senior Housing Project
Pleasanton, CA
June 2013

TREE No.	SPECIES	TRUNK DIAMETER (inches)	HERITAGE TREE?	CONDITION 1=Poor 5=Excellent	SUITABILITY FOR PRESERVATIO	COMMENTS
97	Cabbage tree	6	No	3	Low	Single stem.
98	Evergreen pear	11	No	3	Moderate	Corrected form.
99	Evergreen pear	13	No	3	Low	Codominant at 12'; history of branch failure; thin crown.
100	Evergreen pear	14	No	3	Low	Multiple attachments at 6'; history of branch failure.
101	Silver dollar gum	32	Yes	4	Moderate	Multiple attachments at 6'; one-sided to south
102	Silver dollar gum	28	Yes	4	High	Multiple attachments at 8'; good form and structure.
103	Silver dollar gum	30	Yes	3	Low	History of branch failure; multiple attachments at 7'; thin crown
104	Silver dollar gum	14,12,12,12,10,9,9,7,7	Yes	3	Low	Stump sprouts from base; full dense crown.
105	California pepper	11	No	4	Moderate	Crooked form; basal wound with decay.
106	California pepper	18	Yes	2	Low	Extensive trunk and branch decay; very thin.
107	California pepper	15	No	3	Moderate	Branch dieback.
108	River red gum	32	Yes	2	Low	Extensive wound in trunk extends up into upright stems.
109	Silver dollar gum	10	No	3	Low	Trunk and crown sweep up; codominant attachment removed at base.
110	Italian stone pine	15	No	3	Low	Girdling root; codominant high in crown.
111	Silver dollar gum	18,15,12,8	Yes	3	Low	Multiple attachments at 4'; trunk wound; thin crown.
112	Canary Island pine	12	No	3	Moderate	Tall narrow form; codominant high in crown.
113	Aleppo	23	Yes	3	Moderate	Codominant at 8'; crown beginning to separate.

TREE No.	SPECIES	TRUNK DIAMETER (inches)	HERITAGE TREE?	CONDITION 1=Poor 5=Excellent	SUITABILITY FOR PRESERVATIO	COMMENTS
114	Valley oak	10,5	No	3	Low	Suppressed by #113; poor form; on fence line.
115	Sweetgum	14	No	3	Low	Poor form; twig dieback.
116	Sweetgum	17	No	4	Moderate	Twig dieback; high crown with multiple attachment.
117	Sweetgum	12	No	3	Moderate	Multiple attachments at 12'; low lateral extends over building.
118	Sweetgum	13	No	3	Low	Thin crown; dieback.
119	Sweetgum	15	No	3	Low	Codominant at 6'; large surface roots.
120	Sweetgum	16	No	3	Low	Multiple attachments at 6'; girdling roots;
121	Southern	15	No	3	Low	Thin crown with dieback.
122	English walnut	7,7	No	3	Low	Codominant at 3'; exposed roots.
123	River red gum	56	Yes	3	Moderate	Multiple attachments at 6'; huge tree very close to building; starting to displace foundation; good form; thin crown.
124	Bailey acacia	9	No	2	Low	Poor form and structure; trunk turns 90 degrees at base.
125	Italian stone pine	11	No	2	Low	Failing at base.
126	River red gum	18	Yes	3	Moderate	Corrected form to W.
127	Lombardy poplar	11,10,10,10	No	4	Moderate	Multiple attachments at base; large surface roots.
128	Silver maple	8	No	4	Moderate	Codominant at 6'; full crown.
129	Evergreen pear	10	No	3	Moderate	Crown to S.
130	Mayten	7	No	2	Low	Extensive dieback; trunk decay.
131	Mayten	8	No	3	Low	Codominant at 6'; poor form.
132	Zelkova	16	No	4	Moderate	Multiple attachments at 7'; full wide crown; good form.
133	Canary Island date palm	49	Yes	4	High	6' clear trunk.
134	Siberian elm	6,5	No	3	Moderate	Codominant at base; full crown.

TREE No.	SPECIES	TRUNK DIAMETER (inches)	HERITAGE TREE?	CONDITION 1=Poor 5=Excellent	SUITABILITY FOR PRESERVATIO	COMMENTS
135	Mayten	10	No	3	Low	Codominant at 5'; dieback.
136	Mayten	8,3,3	No	1	Low	Extensive decay.
137	Mayten	9,7	No	3	Low	Codominant at base; dieback.
138	London plane	25	Yes	4	High	Excellent form and structure; heavy low lat over carport; full dense crown.
139	London plane	14	No	2	Low	Extensive twig and branch dieback; epicormic growth.
140	Canary Island pine	19	Yes	3	Moderate	Codominant high in crown.
141	Canary Island pine	18	Yes	4	High	Narrow form.
142	Canary Island pine	22	Yes	5	High	Excellent form and structure.
143	Canary Island pine	17	No	4	High	Corrected form.
144	Canary Island pine	18	Yes	4	High	Good form; a bit thin.
145	Canary Island pine	13	No	4	High	Good form; a bit thin.
146	River red gum	32,26,26,24	Yes	3	Moderate	Multiple attachments at base; topped; thin crown;
147	Plum	6,6,4,4	No	3	Low	Multiple attachments at 2'; twig dieback.
148	River red gum	24	Yes	2	Low	Extensive wound with decay; twig dieback; declining.
149	Almond	8	No	3	Low	Partially failed at base; twig dieback.
150	Almond	10	No	3	Low	Poor form and structure.
151	Almond	7	No	2	Low	Very poor form; branch failure.
152	Valley oak	10,8	Yes	3	Moderate	Twig dieback; codominant at 1'; power lines go through crown.
153	River red gum	12,11,10,9	Yes	3	Moderate	Multiple attachments at base; stump sprouts; full crown.
154	Almond	12	No	3	Low	Poor form and structure; twig dieback.
155	Modesto ash	17	No	3	Low	Crown and trunk to N.
156	Modesto ash	30	Yes	2	Low	Codominant at 7' with crack between stems; cabled and bolted; girdling roots.

TREE No.	SPECIES	TRUNK DIAMETER (inches)	HERITAGE TREE?	CONDITION 1=Poor 5=Excellent	SUITABILITY FOR PRESERVATIO	COMMENTS
157	Hollywood juniper	15	No	3	Low	Crown and trunk severely bow away from building.
158	Hollywood juniper	11	No	3	Low	Suppressed.
159	Modesto ash	31	Yes	3	Moderate	Multiple attachments at 6'; no basal flare; girdling root; thin upper crown.
160	Modesto ash	32	Yes	2	Low	Multiple attachments at 5' with decay below attachment; decay in upright stem; history of branch failure.
161	Raywood ash	16	No	4	Moderate	Good form.
162	Coast redwood	38	Yes	4	High	Multiple stems arise at 25'; full dense crown.
163	Ginkgo	12	No	3	Moderate	Suppressed by neighbor; thin crown;
164	Coast live oak	35	Yes	4	High	Codominant at 2'; trunks fused together; weight of crown to W.
165	Coast live oak	24	Yes	5	High	Excellent form and structure.
166	California black walnut	8,6,6,6	No	3	Low	Multiple attachments from base; stump sprout
167	California black walnut	14,12,12	Yes	2	Low	Off-site, no tag; multiple attachments from base; poor form; center stem and stem to N. are dead.
168	California black walnut	16	No	3	Low	Off-site, no tag; good form; codominant at 7'.
169	California black walnut	24	Yes	3	Low	Off-site, no tag; codominant at 4' with decay in point of attachment.
170	Avocado	12	No	3	Moderate	Off-site, no tag; base at fence; full crown.
171	Siberian elm	14,14,13,12,12,12,12	Yes	3	Low	Off-site, no tag; small grove of trees; stems from base; twig and branch dieback; thin crown.