APPENDIX B

ARBORIST REPORT

Preliminary Arborist Report

Marina Plaza
10122 Bandley Drive
Cupertino, CA

PREPARED FOR
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September 3, 2015

HORT SCIENCE

Preliminary Arborist Report
10122 Bandley Drive
Cupertino, CA

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Introduction and Overview

Bruce Jett Associates, Inc. is planning a new landscape for the redevelopment at 10122 Bandley Drive in Cupertino. Currently, the site contains a supermarket shopping center with associated parking and landscape. HortScience, Inc. was asked to prepare a **Preliminary Arborist Report** for the site as part of the application to the City of Cupertino.

This report provides the following information:

1. An evaluation of the health and structural condition of the trees within 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 drawings provided by the client.
3. Guidelines for tree preservation during the design, construction and maintenance phases of development.

Tree Assessment Methods

Trees were assessed on September 1, 2015. The survey included all trees on site located within the limit of work as identified by the client. The assessment procedure consisted of the following steps:

1. Identifying the species of tree;
2. Tagging each tree with an metal tag and recording its location on a map;
3. Measuring the trunk diameter at a point 48" 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 'high' 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.

Description of Trees

One hundred and one (101) trees representing 15 species were evaluated (Table 1). A majority of the trees were in fair (60%) and poor (29%) condition, and eleven trees (11%) were in good condition. Two street trees on De Anza Boulevard, both in poor condition, were included in the assessment (#20 and 21). Tree sizes ranged from 3 to 28 inches in diameter, with an average trunk diameter of 11 inches. Descriptions of each tree can be found in the ***Tree Assessment*** and tree locations are plotted on the ***Tree Assessment Map*** (see Exhibits).

Table 1. Condition ratings and frequency of occurrence of trees
10122 Bandley Drive, Cupertino, CA

Common Name	Scientific Name	Condition			Total
		Poor (1-2)	Fair (3)	Good (4-5)	
Carob	*Ceratonia siliqua*	2	-	-	**2**
Camphor	*Cinnamomum camphora*	1	-	-	**1**
Carrotwood	*Cupaniopsis anacardioides*	1	-	-	**1**
River red gum	*Eucalyptus camaldulensis*	1	-	-	**1**
Sweetgum	*Liquidambar styraciflua*	2	-	-	**2**
Tulip poplar	*Liriodendron tulipifera*	-	2	-	**2**
Southern magnolia	*Magnolia grandiflora*	17	42	-	**59**
Flaxleaf paperbark	*Melaleuca linariifolia*	-	1	-	**1**
White spruce	*Picea glauca*	-	1	-	**1**
Canary Island pine	*Pinus canariensis*	1	8	9	**18**
Chinese pistache	*Pistacia chinensis*	-	1	1	**2**
Carolina cherry laurel	*Prunus caroliniana*	3	-	-	**3**
Evergreen pear	*Pyrus kawakamii*	1	5	-	**6**
African sumac	*Rhus lancea*	-	1	-	**1**
Coast redwood	*Sequoia sempervirens*	-	1	-	**1**
Total		**29**	**62**	**10**	**101**
		29%	**61%**	**10%**	**100%**

The most common species present was southern magnolia, with 59 trees (59% of the population). Trees were growing in small parking lot planters and in a row along Alves Drive (Photo 1). Overall, trees were in fair (42 trees) and poor (17 trees) condition. Southern magnolias were characterized as being stunted in growth – none of the trees was larger than 12 inches in diameter – and many had thin crowns and twig dieback, conditions that were likely caused by

Photo 1: A row of southern magnolias (#80-95, r-l) along Alves Dr. were in fair and poor condition with small crowns and dieback.

inadequate irrigation. Trees in poor condition had very thin crowns, dieback, and chlorotic (yellow) foliage.

The second most common species was Canary Island pine, with 18 trees (18%). Trees were mature in development; trunk diameters ranged from 14 to 27 inches. Trees were located along the southern perimeter of the site, with two trees in the northeast parking lot. Nine trees were in good condition with good form and structure and dense crowns. Eight trees in fair condition had slightly thin crowns and/or minor structural defects (Photo 2). One tree (#18) was in poor condition; it had no central leader and poor form and structure.

Photo 2: Canary Island pine #16 (l) was in good condition. Tree #17 (r) was in fair condition with good structure and thin lower crown.

Six evergreen pears were evaluated in fair (5 trees) and poor (1 tree) condition. Most had poor form and structure typical of the species.

Three Carolina cherry laurels in poor condition were growing against a building.

Two tulip poplars (#65 and 66), located on the west perimeter, were in fair condition and were mature, with 25-inch diameter trunks (Photo 4). Trees had fair structure, with codominant and multiple stems, and slightly thin crowns. Tree leaves and surrounding pavement were sticky with honeydew – an indication of either scale or aphid infestation.

The remaining trees were represented by two or fewer trees and included the following:

- Two Chinese pistache, one in fair and one in good condition;
- Two carob and two sweetgums in poor condition;
- One flaxleaf paperbark, one coast redwood (Photo 3), one African sumac, and one white spruce, each in fair condition;
- One camphor, one carrotwood, and one river red gum, each in poor condition.

Photo 3 (left): Tulip poplars #65 and 66, growing on a landscape mound along Bandley Dr., were in fair condition.
Photo 4 (right): Coast redwood #64 was located to the south of the tulip poplars and was in fair condition.

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. Carob trees #20 and 21 have low vigor and would likely not be able to cope with the challenges of a new environment as well as healthier 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. For example, African sumac #34 has very poor branch structure and is not a good candidate for preservation.

- **Species response**
  There is a wide variation in the response of individual species to construction impacts and changes in the environment. In general, coast redwood is tolerant of construction impacts and site changes while tulip poplar is only somewhat tolerant 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 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/) lists species identified as being invasive. This site is part of the Central West Floristic Province. River red gum has a *limited* invasive status.

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*** and Table 2). 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: Tree suitability for preservation
10122 Bandley Drive, Cupertino, CA

High These are trees with good health and structural stability that have the potential for longevity at the site. Ten trees had a high suitability for preservation.

Tag #	Species	Diameter	Tag #	Species	Diameter
8	Canary Island pine	17	14	Canary Island pine	23
10	Canary Island pine	14	16	Canary Island pine	17
11	Canary Island pine	17	30	Canary Island pine	21
12	Canary Island pine	18	61	Canary Island pine	23
13	Canary Island pine	22	63	Canary Island pine	23

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. Thirty-four trees had a moderate suitability for preservation.

Tag #	Species	Diameter	Tag #	Species	Diameter
1	Southern magnolia	11	62	Canary Island pine	15
2	Southern magnolia	10	64	Coast redwood	28
3	Southern magnolia	7	65	Tulip poplar	25
5	Southern magnolia	12	66	Tulip poplar	25
15	Canary Island pine	22	68	Southern magnolia	6
19	Chinese pistache	16	73	Southern magnolia	6
27	Chinese pistache	14	75	Southern magnolia	7
31	Canary Island pine	19	77	Southern magnolia	4
41	Southern magnolia	10	80	Southern magnolia	6
43	Southern magnolia	8	81	Southern magnolia	5
44	Southern magnolia	9	82	Southern magnolia	6
45	Southern magnolia	8	83	Southern magnolia	4
47	Southern magnolia	9	84	Southern magnolia	5
52	Southern magnolia	9	87	Southern magnolia	6
53	Southern magnolia	8	91	Southern magnolia	5
55	Canary Island pine	26	92	Southern magnolia	7
56	Canary Island pine	27	100	Southern magnolia	8

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. Fifty-seven trees had low suitability for preservation.

Tag #	Species	Diameter	Tag #	Species	Diameter
4	White spruce	7	24	Carolina cherry laurel	6
6	Southern magnolia	11	25	Flaxleaf paperbark	25
7	Southern magnolia	5	26	Carrotwood	17
9	River red gum	13	28	Sweetgum	16
17	Canary Island pine	24	29	Sweetgum	18
18	Canary Island pine	18	32	Southern magnolia	4
20	Carob	13	33	Camphor	13,6
21	Carob	11	34	African sumac	13,12,9
22	Carolina cherry laurel	6,3,3	35	Southern magnolia	7
23	Carolina cherry laurel	5	36	Southern magnolia	11

(Continued on next page)

Table 2: Tree suitability for preservation, continued
10122 Bandley Drive, Cupertino, CA

Tag #	Species	Diameter	Tag #	Species	Diameter
37	Evergreen pear	10	72	Southern magnolia	3
38	Evergreen pear	13	74	Southern magnolia	5
39	Evergreen pear	14	76	Southern magnolia	5
40	Southern magnolia	12	78	Southern magnolia	5
42	Southern magnolia	6	79	Southern magnolia	4
46	Southern magnolia	6	85	Southern magnolia	4
48	Southern magnolia	6	86	Southern magnolia	3
49	Southern magnolia	9	88	Southern magnolia	3
50	Southern magnolia	7	89	Southern magnolia	4
51	Evergreen pear	11	90	Southern magnolia	4
54	Southern magnolia	5	93	Southern magnolia	3
57	Southern magnolia	6	94	Southern magnolia	6
58	Evergreen pear	7	95	Southern magnolia	4
59	Southern magnolia	10	96	Southern magnolia	6
60	Canary Island pine	25	97	Southern magnolia	5
67	Southern magnolia	5	98	Southern magnolia	4
69	Southern magnolia	6	99	Southern magnolia	6
70	Evergreen pear	13	101	Southern magnolia	1,1,1,1
71	Southern magnolia	5			

Preliminary 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*** was the reference point for tree condition and quality. I referred to the Tree Removal Plan (9/3/15) and the Planting Plan (9/3/15) to estimate impacts to trees.

Plans for the site are in the preliminary stage, therefore the following recommendations and tree protection guidelines can only be considered preliminary. In order for HortScience, Inc. to finalize the report and provide specific tree protection guidelines, the client must provide site plans with the following information:

- Site, demolition, grading/drainage, utility, and landscape/irrigation information with surveyed tree locations on all plans;
- Any modifications to plans that will affect trees intended for preservation.

The plans show an “urban village” with a hotel, retail, and residential buildings, and on-grade parking. Impacts would occur during demolition of the existing structures and infrastructure, as well as during grading across the entire site for new structures and infrastructure.

Because of the intensity of work at the site, there is no opportunity to preserve any on-site trees. Several perimeter trees may be retained, such as river red gum #9, carobs #20 and 21, African sumac #34, and southern magnolia #67; however, their poor health and structural conditions make them unsuitable for preservation.

Based on my review of the plans, 97 trees have been identified for removal (Table 3). Five trees are recommended for removal based on their low suitability for preservation, and 92 trees will be directly impacted by development. Fifty-seven trees had low suitability for preservation, 30 were moderate, and 10 were high.

Four trees were identified for preservation: southern magnolia #47, coast redwood #64, and tulip poplars #65 and 66. All four trees were in fair condition with small or slightly thin crowns. Preservation of these trees depends on:

1. Delineating a Tree Protection Zone around each tree and excluding construction activity from this zone, and

2. Providing irrigation to trees before, during, and after construction.

Table 3: Trees identified for removal
10122 Bandley Drive, Cupertino, CA

Tag #	Species	Diameter	Tag #	Species	Diameter
1	Southern magnolia	11	51	Evergreen pear	11
2	Southern magnolia	10	52	Southern magnolia	9
3	Southern magnolia	7	53	Southern magnolia	8
4	White spruce	7	54	Southern magnolia	5
5	Southern magnolia	12	55	Canary Island pine	26
6	Southern magnolia	11	56	Canary Island pine	27
7	Southern magnolia	5	57	Southern magnolia	6
8	Canary Island pine	17	58	Evergreen pear	7
9	River red gum*	13	59	Southern magnolia	10
10	Canary Island pine	14	60	Canary Island pine	25
11	Canary Island pine	17	61	Canary Island pine	23
12	Canary Island pine	18	62	Canary Island pine	15
13	Canary Island pine	22	63	Canary Island pine	23
14	Canary Island pine	23	67	Southern magnolia*	5
15	Canary Island pine	22	68	Southern magnolia	6
16	Canary Island pine	17	69	Southern magnolia	6
17	Canary Island pine	24	70	Evergreen pear	13
18	Canary Island pine	18	71	Southern magnolia	5
19	Chinese pistache	16	72	Southern magnolia	3
20	Carob*	13	73	Southern magnolia	6
21	Carob*	11	74	Southern magnolia	5
22	Carolina cherry laurel	6,3,3	75	Southern magnolia	7
23	Carolina cherry laurel	5	76	Southern magnolia	5
24	Carolina cherry laurel	6	77	Southern magnolia	4
25	Flaxleaf paperbark	25	78	Southern magnolia	5
26	Carrotwood	17	79	Southern magnolia	4
27	Chinese pistache	14	80	Southern magnolia	6
28	Sweetgum	16	81	Southern magnolia	5
29	Sweetgum	18	82	Southern magnolia	6
30	Canary Island pine	21	83	Southern magnolia	4
31	Canary Island pine	19	84	Southern magnolia	5
32	Southern magnolia	4	85	Southern magnolia	4
33	Camphor	13,6	86	Southern magnolia	3
34	African sumac*	13,12,9	87	Southern magnolia	6
35	Southern magnolia	7	88	Southern magnolia	3
36	Southern magnolia	11	89	Southern magnolia	4
37	Evergreen pear	10	90	Southern magnolia	4
38	Evergreen pear	13	91	Southern magnolia	5
39	Evergreen pear	14	92	Southern magnolia	7
40	Southern magnolia	12	93	Southern magnolia	3
41	Southern magnolia	10	94	Southern magnolia	6
42	Southern magnolia	6	95	Southern magnolia	4
43	Southern magnolia	8	96	Southern magnolia	6
44	Southern magnolia	9	97	Southern magnolia	5
45	Southern magnolia	8	98	Southern magnolia	4
46	Southern magnolia	6	99	Southern magnolia	6
48	Southern magnolia	6	100	Southern magnolia	8
49	Southern magnolia	9	101	Southern magnolia	1,1,1,1
50	Southern magnolia	7			

*Trees identified for removal based on low suitability for preservation

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. Impacts can be minimized by coordinating any construction activities inside the **TREE PROTECTION ZONE**.

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. Any changes to plans affecting trees should be reviewed by the Consulting Arborist with regard to tree impacts. These include, but are not limited to, improvement plans, utility and drainage plans, grading plans, landscape and irrigation plans, and demolition plans.
2. A **TREE PROTECTION ZONE** shall be established around trees to be preserved. No grading, excavation, construction or storage of materials shall occur within that zone. For design purposes, the **TPZ** shall extend to the dripline.
3. Preserve natural grade around trees to the extent possible, especially around the base of trees. Roots beneath fill are often damaged and can die due to disruptions in air and moisture exchange as a result of soil compaction.
4. **Tree Preservation Guidelines**, prepared by the Consulting Arborist, should be included on all plans.
5. Underground services including utilities, sub-drains, water or sewer shall be routed around the **TREE PROTECTION ZONE**. Where encroachment cannot be avoided, special construction techniques such as hand digging or tunneling under roots shall be employed where necessary to minimize root injury.
6. Irrigation systems must be designed so that no trenching will occur within the **TREE PROTECTION ZONE**.

Pre-construction treatments and recommendations

1. Fence trees 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 of Cupertino. Fences are to remain until all construction is completed.
2. Trees to be preserved may require pruning to provide construction clearance. All pruning shall be completed by a Certified Arborist or Tree Worker. Pruning shall adhere to the latest edition of the ANSI Z133 and A300 standards as well as the *Best Management Practices -- Tree Pruning* published by the International Society of Arboriculture.
3. Structures and underground features to be removed within the **TREE PROTECTION ZONE** shall use the smallest equipment, and operate from outside the **TREE PROTECTION ZONE**. The consultant shall be on-site during all operations within the **TREE PROTECTION ZONE** to monitor demolition activity.
4. Trees to be removed that have branches extending into the canopy of trees to remain must be removed by a qualified arborist and not by construction contractors. The qualified arborist shall remove the tree in a manner that causes no damage to adjacent trees and understory to remain. Tree stumps shall be ground 12” below grade.

Recommendations for tree protection during construction

1. Prior to beginning work, the contractors working in the vicinity of trees to be preserved are required to meet with the Consulting Arborist at the site to review all work procedures, access routes, storage areas and tree protection measures.
2. Fences are to remain until all site work has been completed. Fences may not be relocated or removed without permission of the Consulting Arborist.

3. Any demolition or excavation within the dripline or other work that is expected to encounter tree roots should be approved and monitored by the Consulting Arborist. It is important to avoid tearing roots (especially those >2" in diameter) during the excavation process.
4. Trenching or excavation within the TPZ shall be done by hand to a depth of 18" to identify any roots that may require pruning. The Consulting Arborist will identify where root pruning is required. Roots shall be exposed and cut at the limits of excavation with a sharp saw.
5. The Consulting Arborist shall evaluate injuries that occur to trees during construction as soon as possible so that appropriate treatments can be applied.
6. Any additional tree pruning needed for clearance during construction must be performed by a Certified Arborist or Certified Tree Worker and not by construction personnel.

Maintenance of impacted trees
Any trees preserved at the site will experience a physical environment different from that pre-development. 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, provisions for monitoring both tree health and structural stability following construction must be made a priority. As trees age, the likelihood of branches or entire trees failing will increase. Therefore, annual inspection for hazard potential is recommended.

If you have any questions regarding my observations or recommendations, please contact me.

HortScience, Inc.

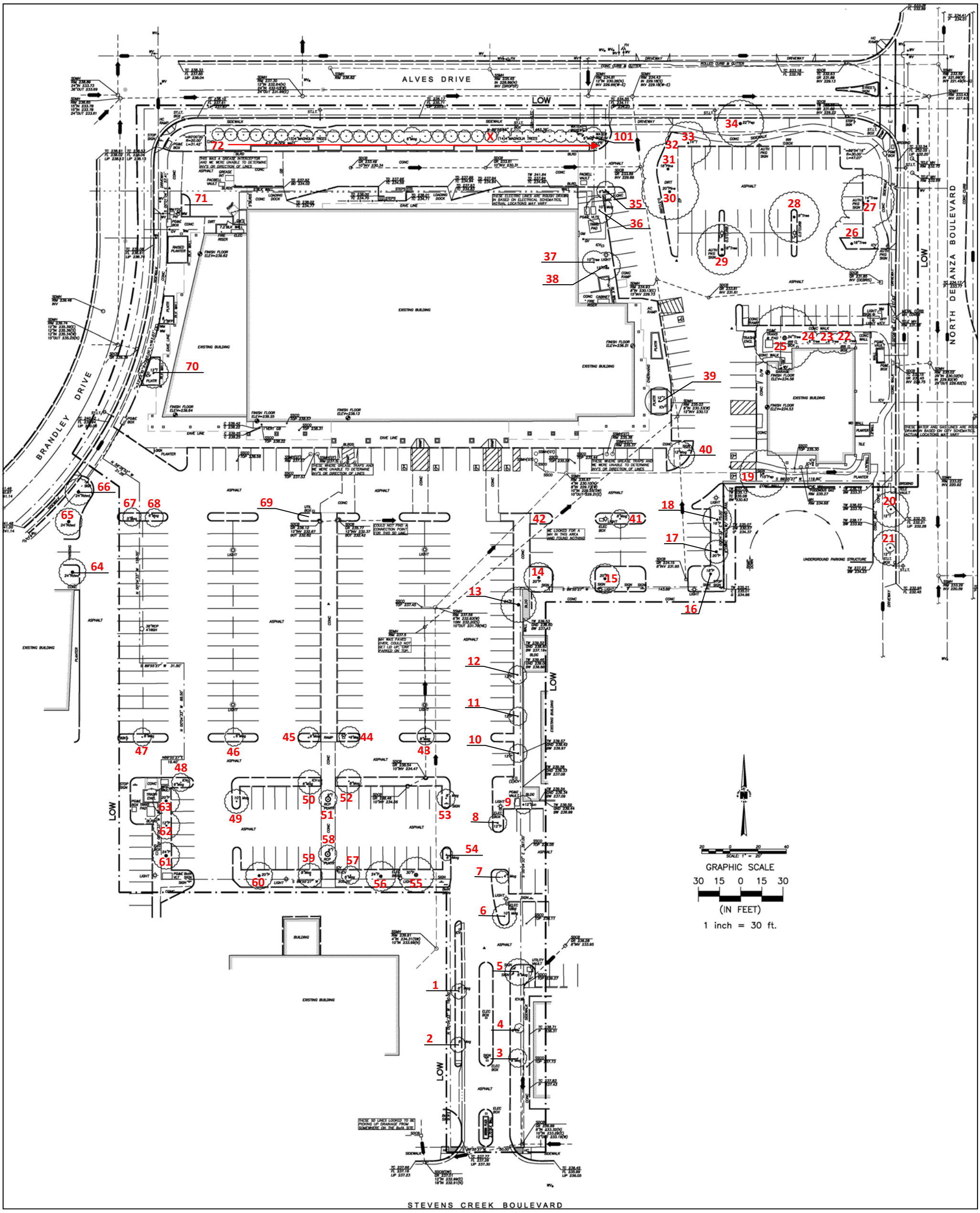
Deanne Ecklund

Deanne Ecklund
Certified Arborist #WE-9067A

Exhibits

Tree Assessment Map

Tree Assessment



Notes:

Base map provided by:
Bruce Jett Associates, Inc.
Orinda, CA

Numbered tree locations are approximate

No Scale

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Tree Assessment Map

Marina Plaza
Cupertino, CA

Prepared for:
Bruce Jett Associates, Inc.
Orinda, CA

August 2015

Tree Assessment

Marina Plaza
Cupertino, California
September 2015

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TREE No.	SPECIES	SIZE DIAMETER (in inches)	CONDITION 1=POOR 5=EXCELLENT	SUITABILITY FOR PRESERVATION	COMMENTS
1	Southern magnolia	11	3	Moderate	Small, slightly thin crown; stunted; in 4' planter; trunk wounds.
2	Southern magnolia	10	3	Moderate	Codominant trunks at 8'; small, slightly thin crown; twig dieback; surface roots.
3	Southern magnolia	7	3	Moderate	Small crown; minor twig dieback; in 6' planter.
4	White spruce	7	3	Low	Small crown; twig and branch dieback; sap oozing from trunk.
5	Southern magnolia	12	3	Moderate	Codominant trunks at 8'; spreading form; minor thinning in upper crown.
6	Southern magnolia	11	2	Low	Very thin crown; upper portion of crown is dead.
7	Southern magnolia	5	2	Low	Small, thin crown; twig and branch dieback.
8	Canary Island pine	17	4	High	Good form and structure; slightly thin lower crown.
9	River red gum	13	2	Low	Codominant trunks at 9'; thin crown; psyllid infestation.
10	Canary Island pine	14	4	High	Good form and structure; slightly thin crown.
11	Canary Island pine	17	4	High	Good form; dense crown; heavy lateral limb.
12	Canary Island pine	18	3	High	Good form and structure; thin lower crown.
13	Canary Island pine	22	3	High	Good form and structure; dense crown; curve in trunk.
14	Canary Island pine	23	5	High	Good form and structure; dense crown.
15	Canary Island pine	22	3	Moderate	Codominant trunks at 10'; spreading form; dense crown.
16	Canary Island pine	17	4	High	Good structure; asymmetrical form; dense crown.
17	Canary Island pine	24	3	Low	Narrow form; interior branch dieback.
18	Canary Island pine	18	2	Low	Lost central leader; codominant stem at 5'; spreading form.
19	Chinese pistache	16	3	Moderate	Multiple attachments at 6'; poor structure; dense crown; spreading form.
20	Carob	13	2	Low	Poor form and structure; very thin crown.
21	Carob	11	2	Low	Poor form and structure; very thin crown.
22	Carolina cherry laurel	6,3,3	2	Low	Poor form and structure; asymmetrical crown; pruned for building clearance.
23	Carolina cherry laurel	5	2	Low	Poor form and structure; asymmetrical crown; base outside of dripline; pruned for building clearance.
24	Carolina cherry laurel	6	2	Low	Poor form and structure; asymmetrical crown; base outside of dripline; pruned for building clearance.
25	Flaxleaf paperbark	25	3	Low	Fair form, poor structure; twig and branch dieback.

Tree Assessment

Marina Plaza
Cupertino, California
September 2015

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TREE No.	SPECIES	SIZE DIAMETER (in inches)	CONDITION 1=POOR 5=EXCELLENT	SUITABILITY FOR PRESERVATION	COMMENTS
26	Carrotwood	17	2	Low	Codominant trunks at 6'; decay in stems; thin crown; twig and branch dieback.
27	Chinese pistache	14	4	Moderate	Multiple attachments at 7'; spreading form; dense crown.
28	Sweetgum	16	2	Low	Codominant trunks at 15'; thin crown; twig and branch dieback.
29	Sweetgum	18	2	Low	Codominant trunks at 7'; poor form and structure; very thin crown.
30	Canary Island pine	21	4	High	Good form and structure; spreading form; crowded by #31.
31	Canary Island pine	19	4	Moderate	Corrected lean; dense crown.
32	Southern magnolia	4	1	Low	Mostly dead; trunk covered in ivy.
33	Camphor	13,6	2	Low	Codominant trunks at 2'; poor form and structure; twig and branch dieback.
34	African sumac	13,12,9	3	Low	Multiple attachments at 4'; poor form and structure; spreading form; suckers.
35	Southern magnolia	7	3	Low	Small crown; stunted form; surface roots.
36	Southern magnolia	11	3	Low	Multiple attachments at 10'; asymmetrical crown; surface roots; utility vault near base.
37	Evergreen pear	10	3	Low	Poor form and structure; asymmetrical crown; twig dieback.
38	Evergreen pear	13	3	Low	Poor form and structure; asymmetrical crown; fire blight.
39	Evergreen pear	14	3	Low	Poor form and structure; 45° lean; spreading form; fire blight.
40	Southern magnolia	12	3	Low	Multiple attachments at 5'; small crown; stunted form.
41	Southern magnolia	10	3	Moderate	Codominant trunks at 9'; interior twig dieback.
42	Southern magnolia	6	2	Low	Codominant trunks at 7'; twig and branch dieback; in decline.
43	Southern magnolia	8	3	Moderate	Small crown; stunted form; minor twig dieback.
44	Southern magnolia	9	3	Moderate	Multiple attachments at 8'; small crown; stunted form; minor twig dieback.
45	Southern magnolia	8	3	Moderate	Codominant trunks at 8'; small crown; stunted form.
46	Southern magnolia	6	3	Low	Small crown; stunted form; minor twig dieback; trunk wound.
47	Southern magnolia	9	3	Moderate	Multiple attachments at 6'; small crown; stunted form.
48	Southern magnolia	6	2	Low	Very thin crown; twig and branch dieback; in decline.
49	Southern magnolia	9	3	Low	Small crown; stunted form; minor twig dieback; trunk wound.
50	Southern magnolia	7	3	Low	Small crown; stunted form; poor color.

Tree Assessment

Marina Plaza
Cupertino, California
September 2015

HORT SCIENCE

TREE No.	SPECIES	SIZE DIAMETER (in inches)	CONDITION 1=POOR 5=EXCELLENT	SUITABILITY FOR PRESERVATION	COMMENTS
51	Evergreen pear	11	2	Low	Codominant trunks at 14'; poor form and structure; in small raised planter.
52	Southern magnolia	9	3	Moderate	Small crown; stunted form.
53	Southern magnolia	8	3	Moderate	Small crown; stunted form; poor color.
54	Southern magnolia	5	1	Low	Mostly dead.
55	Canary Island pine	26	3	Moderate	Fair form and structure; heavy lateral limb over parking lot.
56	Canary Island pine	27	3	Moderate	Multiple attachments at 20'; spreading form.
57	Southern magnolia	6	1	Low	Mostly dead.
58	Evergreen pear	7	3	Low	Poor form and structure; in small raised planter.
59	Southern magnolia	10	2	Low	Very thin crown; twig and branch dieback.
60	Canary Island pine	25	3	Low	Fair form and structure; history of branch failure; small crown.
61	Canary Island pine	23	4	High	Good form and structure; slightly thin crown.
62	Canary Island pine	15	3	Moderate	Crowded form; slightly chlorotic.
63	Canary Island pine	23	4	High	Good form and structure; slightly thin crown.
64	Coast redwood	28	3	Moderate	Asymmetrical form; dry needles; slightly thin crown.
65	Tulip poplar	25	3	Moderate	Codominant trunks at 22'; curve in trunk; thin crown; aphids.
66	Tulip poplar	25	3	Moderate	Multiple attachments at 7'; upright form; aphids.
67	Southern magnolia	5	3	Low	Small crown; slightly thin crown; twig dieback.
68	Southern magnolia	6	3	Moderate	Multiple attachments at 7'; small crown.
69	Southern magnolia	6	2	Low	Poor form and structure; small crown.
70	Evergreen pear	13	3	Low	Multiple attachments at 10'; slightly thin crown; fire blight; in raised planter.
71	Southern magnolia	5	3	Low	Small crown; stunted growth; poor color.
72	Southern magnolia	3	3	Low	Small crown; stunted growth; poor color.
73	Southern magnolia	6	3	Moderate	Small crown; minor twig dieback.
74	Southern magnolia	5	3	Low	Crowded form; twig dieback.
75	Southern magnolia	7	3	Moderate	Small crown; good form.
76	Southern magnolia	5	3	Low	Small crown; crowded by #75; twig dieback.

Tree Assessment

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HORT SCIENCE

TREE No.	SPECIES	SIZE DIAMETER (in inches)	CONDITION 1=POOR 5=EXCELLENT	SUITABILITY FOR PRESERVATION	COMMENTS
77	Southern magnolia	4	3	Moderate	Small crown; stunted growth.
78	Southern magnolia	5	3	Low	Small crown; twig dieback; stunted.
79	Southern magnolia	4	2	Low	Small crown; twig dieback; thin crown.
80	Southern magnolia	6	3	Moderate	Small crown; twig dieback; wire embedded in trunk.
81	Southern magnolia	5	3	Moderate	Small crown; stunted growth.
82	Southern magnolia	6	3	Moderate	Small crown; minor twig dieback.
83	Southern magnolia	4	3	Moderate	Small crown; minor twig dieback.
84	Southern magnolia	5	3	Moderate	Small crown; minor twig dieback.
85	Southern magnolia	4	2	Low	Small, thin crown; twig dieback.
86	Southern magnolia	3	1	Low	Very thin crown; in decline.
87	Southern magnolia	6	3	Moderate	Small crown; minor twig dieback.
88	Southern magnolia	3	2	Low	Small, thin crown; twig dieback.
89	Southern magnolia	4	2	Low	Small, thin crown; twig and branch dieback.
90	Southern magnolia	4	3	Low	Small crown; twig dieback; stunted.
91	Southern magnolia	5	3	Moderate	Small crown; minor twig dieback.
92	Southern magnolia	7	3	Moderate	Small crown; minor twig dieback.
93	Southern magnolia	3	3	Low	Small crown; twig dieback; stunted.
94	Southern magnolia	6	3	Low	Small, thin crown; twig dieback; stunted.
95	Southern magnolia	4	3	Low	Small, thin crown; twig dieback; stunted.
96	Southern magnolia	6	3	Low	Small, thin crown; twig dieback; stunted.
97	Southern magnolia	5	3	Low	Small, thin crown; twig dieback; stunted.
98	Southern magnolia	4	2	Low	Very thin crown; twig and branch dieback.
99	Southern magnolia	6	2	Low	Poor form and structure; very thin crown; twig and branch dieback.
100	Southern magnolia	8	3	Moderate	Small crown; utility vault s at base.
101	Southern magnolia	1,1,1,1	2	Low	Sprouts from broken trunk.