



DATE: May 18, 2016

AGENDA ITEM # 4

TO: Design Review Commission
FROM: Sean K. Gallegos, Assistant Planner
SUBJECT: 16-SC-08 – 581 University Avenue

RECOMMENDATION:

Approve design review application 16-SC-08 subject to the listed findings and conditions

PROJECT DESCRIPTION

This is a design review application for a new two-story house. The project includes 1,416 square feet on the first story, 482 square feet on the second story, and a 408 square-foot detached garage. The following table summarizes the project's technical details:

GENERAL PLAN DESIGNATION:	Single-family, Residential
ZONING:	R1-10
PARCEL SIZE:	6,696 square feet
MATERIALS:	Standing seam metal roof, board and batten siding, aluminum clad windows, fiberglass columns, wood trim and doors

	Existing	Proposed	Allowed/Required
LOT COVERAGE:	1,139 square feet	1,982 square feet	2,090 square feet
FLOOR AREA:			
First floor	1,139 square feet	1,824 square feet	
Second floor	N/A	482 square feet	
Total	1,139 square feet	2,306 square feet	2,344 square feet
SETBACKS:			
Front	25 feet	25 feet	25 feet
Rear	68 feet	58.8 feet	25 feet
Right side (1 st /2 nd)	5 feet/ N/A	5 feet/12.5 feet	5 feet/12.5 feet
Left side(1 st /2 nd)	17.5 feet/ N/A	5 feet/12.5 feet	5 feet/12.5 feet
HEIGHT:	11 feet	23.5 feet	27 feet

BACKGROUND

Neighborhood Context

The subject property is located in a Diverse Character Neighborhood, as defined in the City's Residential Design Guidelines. The site is located on the north side of University Avenue between Sherman Street and Sheridan Street. The houses in this neighborhood tend to have varied setbacks, architectural styles and massing. However, there are some similar characteristics, such as low eave lines and the use of rustic materials, in the neighborhood. The houses on the south side of University Avenue have front facing garages, while the houses on the north side have detached garages in the rear that are accessed from an alley. The landscaping along University Avenue varies; however, portions of the street have a distinct landscape pattern.

Zoning Compliance

The subject property is considered a narrow corner lot, which is defined as a lot that is less than 80-feet in width. For narrow lots, the interior side yard setback is reduced from 10 feet to 10 percent of the width of the lot, with an additional 7.5 feet added for the second story setback. Since the lot is 50 feet in width, the required interior side yard setback is 5 feet with a second story side yard setback of 12.5 feet.

DISCUSSION

Design Review

According to the Design Guidelines, in Diverse Character Neighborhoods, good neighbor design has its own design integrity while incorporating some design elements and materials found in the neighborhood.

The structure uses a farmhouse inspired design style with gabled and hipped roofs, corbels, board and batten siding, and front porch with columns. The design has integrity as a more modern farmhouse style and incorporates new materials such as a metal roof to the rustic wood siding and architectural details. The design uses wall articulation on the first story and rustic materials to soften the overall appearance of the home. The smaller single-story elements relate well to the immediate surroundings of the neighborhood. The detached garage is located behind the home and can be accessed from the alley at the rear of the property. The City's Design Guidelines suggest avoiding designs that make the garage the focal point of the house. By utilizing the alley in the rear, the impacts are reduced as viewed from University Avenue.

The project incorporates high quality materials that relate well to the existing materials found in the neighborhood. The materials include standing seam metal roof, board and batten siding, aluminum clad windows and wood trim and doors. Fiberglass columns are proposed for the front porch, but the fiberglass material is not a high quality material or consistent with the Craftsman architectural style. Staff recommends replacing the fiberglass columns with wood or a high quality material (Condition No. 3). Overall, the materials are compatible with the surrounding neighborhood and integral to the architectural design of the house.

The proposed project is sensitive to the scale of the neighborhood and incorporates similar forms and materials found within the neighborhood context. The project has low finished floors and nine-foot, six-inch wall plate heights at the first-story and eight-foot wall plates at the second-story for an overall height of 23.5 feet. The design incorporates simple gable and hip roof forms with a front porch that wraps around the left side of the structure. The porch and the horizontal eave lines break up the two-story massing of the front elevation and side elevations. The second floor is centered over the first story and visually softened by being recessed within the roofline of the structure. Overall, the project is designed to minimize the perception of bulk and mass, and relate well to the adjacent properties.

Miscellaneous

To preserve the neighboring property's (575 University Avenue) coast live oak tree (No. 5), the applicant increased the accessory structure's side and rear yard setbacks and moved the uncovered parking space to the left (east) side of the accessory structure (Site Plan Sheet A-3). However, the grading and drainage plan does not reflect the increased accessory structure setback or the uncovered parking space along the left (east) side of the accessory structure. Condition No. 4 requires the grading and drainage plan be revised to be consistent with the site plan.

Privacy

On the left (north) side elevation of the second story, there are two windows: one egress window in bedroom No. 1 with a three-foot, three-inch sill height and one small stairwell window with a ten-foot, six-inch sill height from the stairwell landing. Due to the placement and sill height of the stairwell window, it does not create an unreasonable privacy impact. The bedroom window may have views of the neighboring property, and the window sill heights could be raised to minimize privacy requirements. Therefore, staff recommends the following:

- Raise sill heights of the windows in bedrooms No. 1 to 44-inches, maximum allowable minimum egress sill height, from the second story finished floor.

On the right (south) side elevation of the second story, there are four windows: one medium-sized window is located in the hallway with a three-foot sill height, two smaller window in bedroom No. 2 with four-foot, nine-inch sill heights, and one smaller window is in bathroom No. 2 with a four-foot, nine-inch sill height. Due to the placement and sill heights of the bedroom 2 and bathroom windows, they do not create unreasonable privacy impacts. However, the medium-sized hallway window may have views toward the neighboring. Therefore, staff recommends the following:

- Raise the sill height of the right side facing window in the hallway to 54-inches from the second story finished floor.

The reduced setbacks of the narrow lot may allow window closer to adjacent properties; however, the large rear yard setback of 79 feet and the proposed trees along the side and rear property lines reduce potential privacy impacts.

Landscaping

There are five trees on the property. The project proposes removal of the large coast live tree (Nos. 2) in the rear yard due to being located within the building footprint and being in poor condition. The landscape plan maintains a coast live oak tree (No. 1) and proposes a crape myrtle tree in the front yard, a 36-inch box coast live oak tree in the rear yard, front yard landscaping and evergreen screening trees along both sides. Two mature redwood trees are on the adjacent property at 575 University Avenue (no., 4-5), and they will be protected during construction. Overall, the project meet the City's landscape regulations and street tree guidelines. Since the project includes a new house and new landscaping area that exceeds 500 square feet, it is subject to the City's Water Efficient Landscape Ordinance.

ENVIRONMENTAL REVIEW

This project is categorically exempt from environmental review under Section 15303 of the California Environmental Quality Act because it involves the construction of a new single-family dwelling in a residential zone.

PUBLIC CONTACT

A public meeting notice was posted on the property and mailed to 14 nearby property owners on Orange Avenue and University Avenue

Cc: Via Builders, Applicant/Designer
Cam Chan, Owner

Attachments:

- A. Application
- B. Neighborhood Compatibility Worksheet
- C. Area, Vicinity and Notification Map
- D. Tree Survey, Urban Tree Management

FINDINGS

16-SC-08 – 581 University Avenue

With regard to the design review for the new two-story structure, the Design Review Commission finds the following in accordance with Section 14.76.050 of the Municipal Code:

- a. The proposed structure complies with all provisions of this chapter;
- b. The height, elevations, and placement on the site of the proposed structure, when considered with reference to the nature and location of residential structures on adjacent lots, will avoid unreasonable interference with views and privacy and will consider the topographic and geologic constraints imposed by particular building site conditions;
- c. The natural landscape will be preserved insofar as practicable by minimizing tree and soil removal; grade changes shall be minimized and will be in keeping with the general appearance of neighboring developed areas;
- d. The orientation of the proposed structure in relation to the immediate neighborhood will minimize the perception of excessive bulk and mass;
- e. General architectural considerations, including the character, size, scale, and quality of the design, the architectural relationship with the site and other buildings, building materials, and similar elements have been incorporated in order to insure the compatibility of the development with its design concept and the character of adjacent buildings; and
- f. The proposed structure has been designed to follow the natural contours of the site with minimal grading, minimum impervious cover, and maximum erosion protection.

CONDITIONS

16-SC-08 – 581 University Avenue

GENERAL

1. **Approved Plans**
The approval is based on the plans and materials received on April 26, 2016, except as may be modified by these conditions.
2. **Window Sill Height**
Raise the sill height of the left (north) side second story bedroom window to 44-inches from the finished floor, and raise the sill height of the right (south) side second story window in the hallway to 54-inches from the finished floor.
3. **Columns**
The front porch columns shall be revised to wood or a high quality rustic material.
4. **Grading and Drainage Plan**
The grading and drainage plan shall be revised to be consistent with the site plan.
5. **Protected Trees**
The following trees (Nos. 1 and 3-5), the proposed street trees, the new coast live oak tree and privacy screening trees shall be protected under this application and cannot be removed without a tree removal permit from the Community Development Director.
6. **Encroachment Permit**
An encroachment permit shall be obtained from the Engineering Division prior to doing any work within the public right-of-way including the street shoulder.
7. **New Fireplaces**
Only gas fireplaces, pellet fueled wood heaters or EPA certified wood-burning appliances may be installed in all new construction pursuant to Chapter 12.64 of the Municipal Code.
8. **Landscaping**
The landscape plan is subject to the City's Water Efficient Landscape Regulations pursuant to Chapter 12.36 of the Municipal Code.
9. **Fire Sprinklers**
Fire sprinklers shall be required pursuant to Section 12.10 of the Municipal Code.
10. **Underground Utilities**
Any new utility service drops shall be located underground from the nearest convenient existing pole pursuant to Chapter 12.68 of the Municipal Code.
11. **Indemnity and Hold Harmless**
The applicant/owner agrees to indemnify, defend, protect, and hold the City harmless from all costs and expenses, including attorney's fees, incurred by the City or held to be the liability of the City in connection with the City's defense of its actions in any proceedings brought in any State or Federal Court, challenging any of the City's action with respect to the applicant's project.

PRIOR TO ISSUANCE OF BUILDING OR DEMOLITION PERMIT

12. Tree Protection

Tree protection fencing shall be installed around the dripline, or as required by the project arborist, of the following trees (Nos. 1 and 3-5) as shown on the site plan. Tree protection fencing shall be chain link and a minimum of five feet in height with posts driven into the ground and shall not be removed until all building construction has been completed unless approved by the Planning Division.

PRIOR TO BUILDING PERMIT SUBMITTAL

13. Conditions of Approval

Incorporate the conditions of approval into the title page of the plans.

14. Tree Protection Note

On the grading plan and/or the site plan, show all tree protection fencing and add the following note: "All tree protection fencing shall be chain link and a minimum of five feet in height with posts driven into the ground."

15. Water Efficient Landscape Plan

Provide a landscape documentation package prepared by a licensed landscape professional showing how the project complies with the City's Water Efficient Landscape Regulations.

16. Green Building Standards

Provide verification that the house will comply with the California Green Building Standards pursuant to Section 12.26 of the Municipal Code and provide a signature from the project's Qualified Green Building Professional Designer/Architect and property owner.

17. Underground Utility Location

Show the location of underground utilities pursuant to Section 12.68 of the Municipal Code. Underground utility trenches shall avoid the drip-lines of all protected trees unless approved by the project arborist and the Planning Division.

18. Air Conditioner Sound Rating

Show the location of any air conditioning units on the site plan and the manufacturer's specifications showing the sound rating for each unit.

19. Storm Water Management

Show how the project is in compliance with the New Development and Construction Best Management Practices and Urban Runoff Pollution Prevention program, as adopted by the City for the purposes of preventing storm water pollution (i.e. downspouts directed to landscaped areas, minimize directly connected impervious areas, etc.).

PRIOR TO FINAL INSPECTION

20. Landscaping Installation

All landscaping, street trees and privacy screening trees shall be maintained and/or installed as shown on the approved plans and as required by the Planning Division.

21. Green Building Verification

Submit verification that the house was built in compliance with the City's Green Building Ordinance (Section 12.26 of the Municipal Code).

22. Water Efficient Landscaping Verification

Provide a landscape Certificate of Completion verifying that the landscaping and irrigation were installed per the approved landscape documentation package.

ATTACHMENT A



CITY OF LOS ALTOS GENERAL APPLICATION



Type of Review Requested: *(Check all boxes that apply)*

Permit # 1107069

<input type="checkbox"/>	One-Story Design Review	<input type="checkbox"/>	Commercial/Multi-Family	<input type="checkbox"/>	Environmental Review
<input checked="" type="checkbox"/>	Two-Story Design Review	<input type="checkbox"/>	Sign Permit	<input type="checkbox"/>	Rezoning
<input type="checkbox"/>	Variance	<input type="checkbox"/>	Use Permit	<input type="checkbox"/>	R1-S Overlay
<input type="checkbox"/>	Lot Line Adjustment	<input type="checkbox"/>	Tenant Improvement	<input type="checkbox"/>	General Plan/Code Amendment
<input type="checkbox"/>	Tentative Map/Division of Land	<input type="checkbox"/>	Sidewalk Display Permit	<input type="checkbox"/>	Appeal
<input type="checkbox"/>	Historical Review	<input type="checkbox"/>	Preliminary Project Review	<input type="checkbox"/>	Other:

Project Address/Location: 581 University Ave

Project Proposal/Use: Residence Current Use of Property: Residence

Assessor Parcel Number(s): 175-15-014 Site Area: 6696 #

New Sq. Ft.: 2331 SF Altered/Rebuilt Sq. Ft.: 0 Existing Sq. Ft. to Remain: 0

Total Existing Sq. Ft.: 1148 # Total Proposed Sq. Ft. (including basement): 3756.8 #

Is the site fully accessible for City Staff inspection? Yes

Applicant's Name: Via Builders Inc.

Telephone No.: 650-948-1077 Email Address: viabuilders@gmail.com

Mailing Address: 4600 El Camino Real #209

City/State/Zip Code: Los Altos, CA 94022

Property Owner's Name: Chan, Cam

Telephone No.: 650-776-1825 Email Address: camchan@gmail.com

Mailing Address: 575 University Ave, Los Altos 94022

City/State/Zip Code: _____

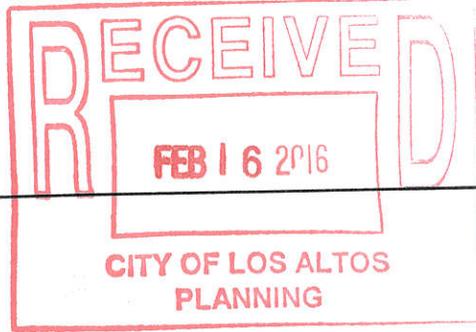
Architect/Designer's Name: Via Builders Inc.

Telephone No.: _____ Email Address: _____

Mailing Address: _____

City/State/Zip Code: _____

* If your project includes complete or partial demolition of an existing residence or commercial building, a demolition permit must be issued and finalized prior to obtaining your building permit. Please contact the Building Division for a demolition package. *



ATTACHMENT B

City of Los Altos

Planning Division

(650) 947-2750

Planning@losaltosca.gov

NEIGHBORHOOD COMPATIBILITY WORKSHEET

In order for your design review application for single-family residential remodel/addition or new construction to be successful, it is important that you consider your property, the neighborhood's special characteristics that surround that property and the compatibility of your proposal with that neighborhood. **The purpose is to help you understand your neighborhood before you begin the design process with your architect/designer/builder or begin any formal process with the City of Los Altos.** *Please note that this worksheet must be submitted with your 1st application.*

The Residential Design Guidelines encourage neighborhood compatibility without necessarily forsaking individual taste. Various factors contribute to a design that is considered compatible with a surrounding neighborhood. The factors that City officials will be considering in your design could include, but are not limited to: design theme, scale, bulk, size, roof line, lot coverage, slope of lot, setbacks, daylight plane, one or two-story, exterior materials, landscaping et cetera.

It will be helpful to have a site plan to use in conjunction with this worksheet. Your site plan should accurately depict your property boundaries. The best source for this is the legal description in your deed.

Photographs of your property and its relationship to your neighborhood (see below) will be a necessary part of your first submittal. Taking photographs before you start your project will allow you to see and appreciate that your property could be within an area that has a strong neighborhood pattern. The photographs should be taken from across the street with a standard 35mm camera and organized by address, one row for each side of the street. Photographs should also be taken of the properties on either side and behind your property from on your property.

This worksheet/check list is meant to help *you* as well as to help the City planners and Planning Commission understand your proposal. Reasonable guesses to your answers are acceptable. The City is not looking for precise measurements on this worksheet.

Project Address 581 University Ave
Scope of Project: Addition or Remodel or New Home
Age of existing home if this project is to be an addition or remodel? N/A
Is the existing house listed on the City's Historic Resources Inventory? NO

Address: 581 UNIVERSITY AVE.
Date: _____

What constitutes your neighborhood?

There is no clear answer to this question. For the purpose of this worksheet, consider first your street, the two contiguous homes on either side of, and directly behind, your property and the five to six homes directly across the street (eight to nine homes). At the minimum, these are the houses that you should photograph. If there is any question in your mind about your neighborhood boundaries, consider a radius of approximately 200 to 300 feet around your property and consider that your neighborhood.

Streetscape

1. Typical neighborhood lot size*:

Lot area: +/- 6700 SF square feet
Lot dimensions: Length 135 feet
Width 50 feet

If your lot is significantly different than those in your neighborhood, then note its: area _____, length _____, and width _____.

2. Setback of homes to front property line: (Pgs. 8-11 Design Guidelines)

Existing front setback if home is a remodel? N/A
What % of the front facing walls of the neighborhood homes are at the front setback 100 %

Existing front setback for house on left 25 ft./on right
25 ft.

Do the front setbacks of adjacent houses line up? No - The front
CURVES

3. Garage Location Pattern: (Pg. 19 Design Guidelines)

Indicate the relationship of garage locations in your neighborhood* only on your street (count for each type)

Garage facing front projecting from front of house face 1

Garage facing front recessed from front of house face 0

Garage in back yard 9

Garage facing the side 1

Number of 1-car garages 1; 2-car garages 9; 3-car garages 0

Address: 581 UNIVERSITY AVE.
Date: _____

4. **Single or Two-Story Homes:**

What % of the homes in your neighborhood* are:

One-story 40%

Two-story 60%

5. **Roof heights and shapes:**

Is the overall height of house ridgelines generally the same in your neighborhood*? Yes

Are there mostly hip , gable style , or other style roofs*? Even mix

Do the roof forms appear simple or complex ?

Do the houses share generally the same eave height Yes?

6. **Exterior Materials:** (Pg. 22 Design Guidelines)

What siding materials are frequently used in your neighborhood*?

wood shingle stucco board & batten clapboard
 tile stone brick combination of one or more materials
(if so, describe) _____

What roofing materials (wood shake/shingle, asphalt shingle, flat tile, rounded tile, cement tile, slate) are consistently (about 80%) used?

Comp Shingles

If no consistency then explain: _____

7. **Architectural Style:** (Appendix C, Design Guidelines)

Does your neighborhood* have a consistent identifiable architectural style?

YES NO

Type? Ranch Shingle Tudor Mediterranean/Spanish
 Contemporary Colonial Bungalow Other

Address: 581 UNIVERSITY AVE.

Date: _____

8. **Lot Slope:** (Pg. 25 Design Guidelines)

Does your property have a noticeable slope? NO

What is the direction of your slope? (relative to the street)

Rises Left to Right approx 1ft in 50ft

Is your slope higher lower same in relationship to the neighboring properties? Is there a noticeable difference in grade between your property/house and the one across the street or directly behind?

9. **Landscaping:**

Are there any frequently used or typical landscaping features on your street (i.e. big trees, front lawns, sidewalks, curbs, landscape to street edge, etc.)?

Big trees, obscured views

How visible are your house and other houses from the street or back neighbor's property?

Some houses are completely obscured but most are quite prominent and visible

Are there any major existing landscaping features on your property and how is the unimproved public right-of-way developed in front of your property (gravel, dirt, asphalt, landscape)?

landscape strip between sidewalk & Road
Large oak dominates the middle of property - needs to be removed

10. **Width of Street:**

What is the width of the roadway paving on your street in feet? 32'

Is there a parking area on the street or in the shoulder area? NO

Is the shoulder area (unimproved public right-of-way) paved, unpaved, gravel, landscaped, and/or defined with a curb/gutter? Landscaped

with ground cover. No trees in planter strip in front of property.

Address: 581 UNIVERSITY AVE.

Date: _____

11. What characteristics make this neighborhood* cohesive?

Such as roof material and type (hip, gable, flat), siding (board and batten, cement plaster, horizontal wood, brick), deep front yard setbacks, horizontal feel, landscape approach etc.:

Setbacks are equa-distant but staggered due to curve in R.O.W. Houses are all different in size, shape and finish appearance.

General Study

- A. Have major visible streetscape changes occurred in your neighborhood?
 YES NO
- B. Do you think that most (~ 80%) of the homes were originally built at the same time?
 YES NO
- C. Do the lots in your neighborhood appear to be the same size?
 YES NO
- D. Do the lot widths appear to be consistent in the neighborhood?
 YES NO
- E. Are the front setbacks of homes on your street consistent (~80% within 5 feet)?
 YES NO
- F. Do you have active CCR's in your neighborhood? (p.36 Building Guide)
 YES NO
- G. Do the houses appear to be of similar size as viewed from the street?
 YES NO
- H. Does the new exterior remodel or new construction design you are planning relate in most ways to the prevailing style(s) in your existing neighborhood?
 YES NO

Address: 581 UNIVERSITY AVE.
 Date: _____

Summary Table

Please use this table to summarize the characteristics of the houses in your immediate neighborhood (two homes on either side, directly behind and the five to six homes directly across the street).

Address	Front setback	Rear setback	Garage location	One or two stories	Height	Materials	Architecture (simple or complex)
575 University	25'		Rear Alley	2	26'	Stucco, Cedar shingle	Simple
591 University	25'		Rear Alley	1	18'	Lap siding, Comp shingles	Simple
580 Orange	25'		Rear Alley	2	26'	Stucco, Cedar shingles, Comp shingles	Simple
614 University	25'		Front	1	16'	Stucco S tile roof	Simple
562 University	25'		side Facing	2	26'	Brick, Stucco Flat tile roof	Simple
569 University	25'		Rear Alley	2	26'	Lap siding Comp shingles	Simple
599 University	25'		Rear Alley	1	18'	Lap siding Comp shingles	Simple



599 University



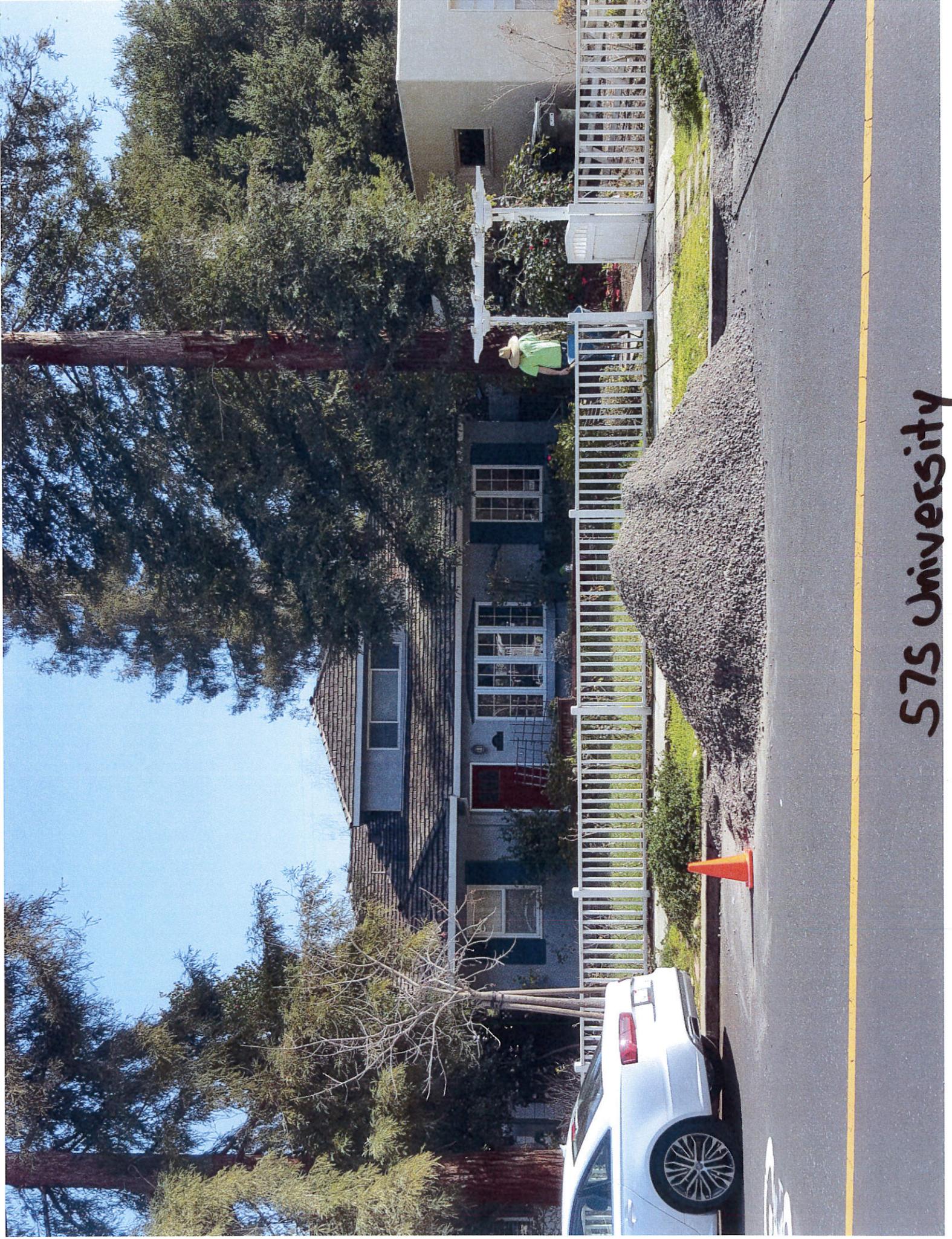
S91 University



SBI University



581 University



575 University



569 University



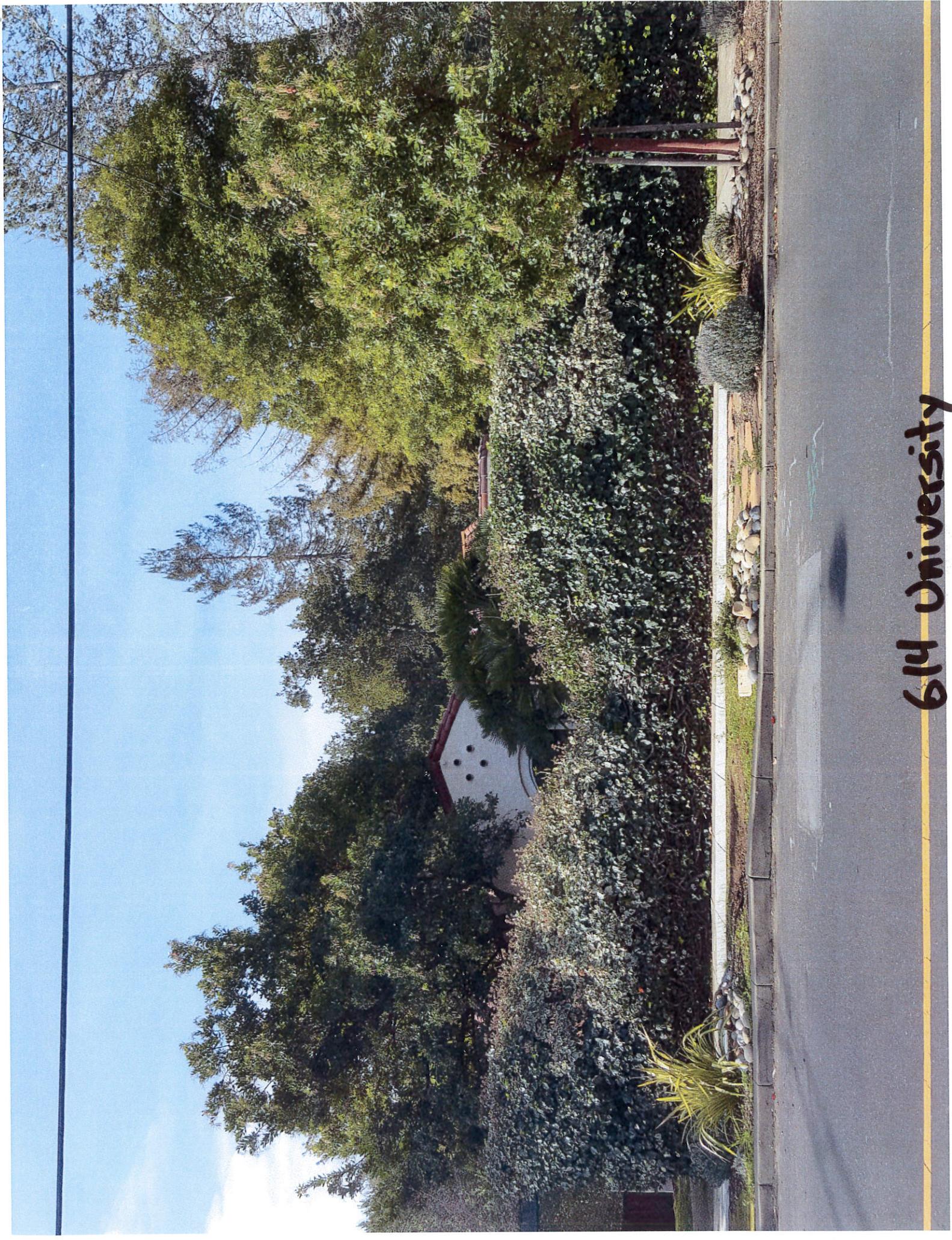
562 University



562 University

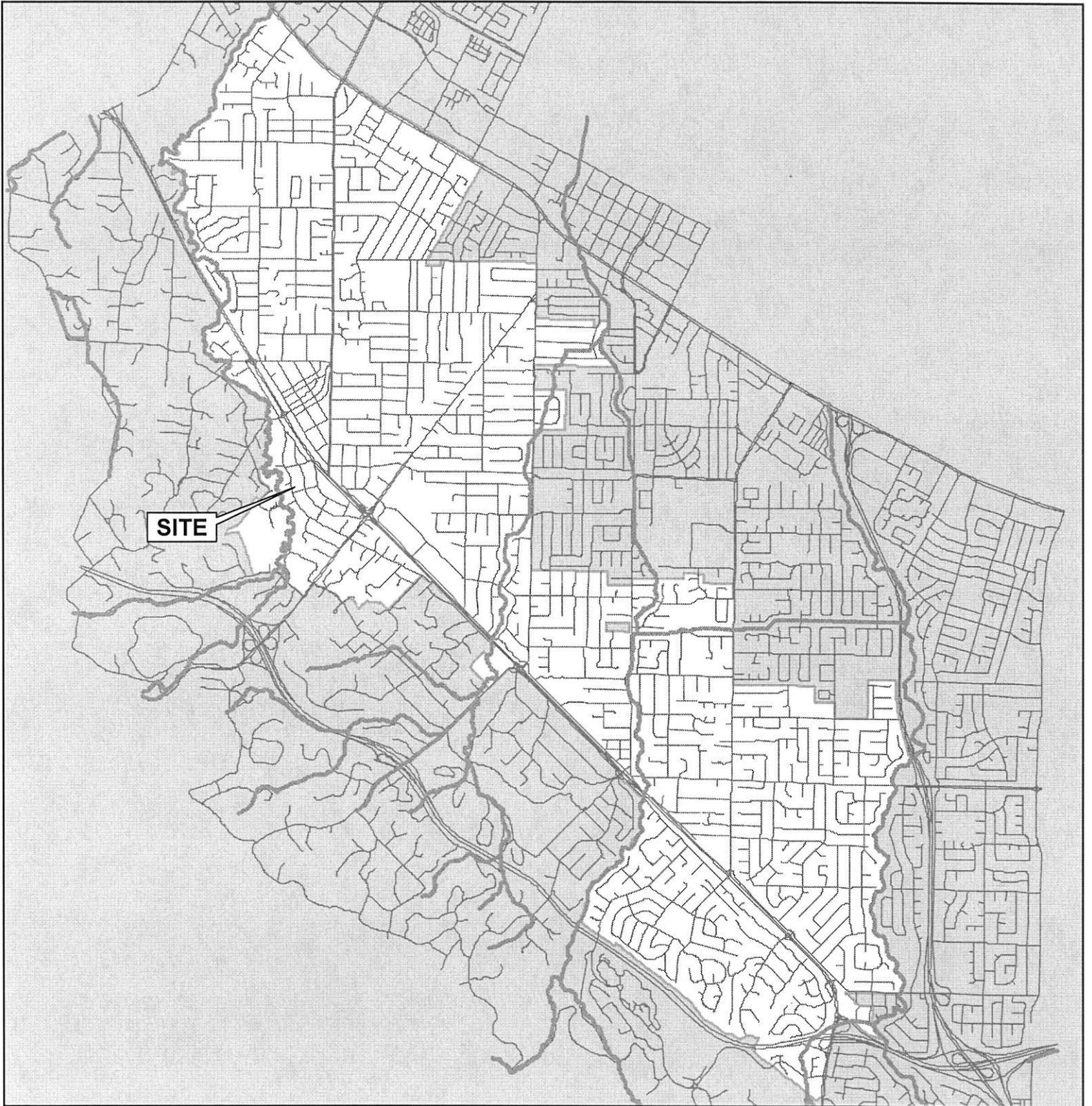


Directly Across Street ~~143'~~ 143' wide



614 University

ATTACHMENT C AREA MAP



CITY OF LOS ALTOS

APPLICATION: 16-SC-08
APPLICANT: Via Builders Inc./ C. Chan
SITE ADDRESS: 581 University Avenue

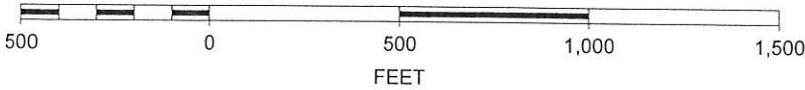


Not to Scale

VICINITY MAP



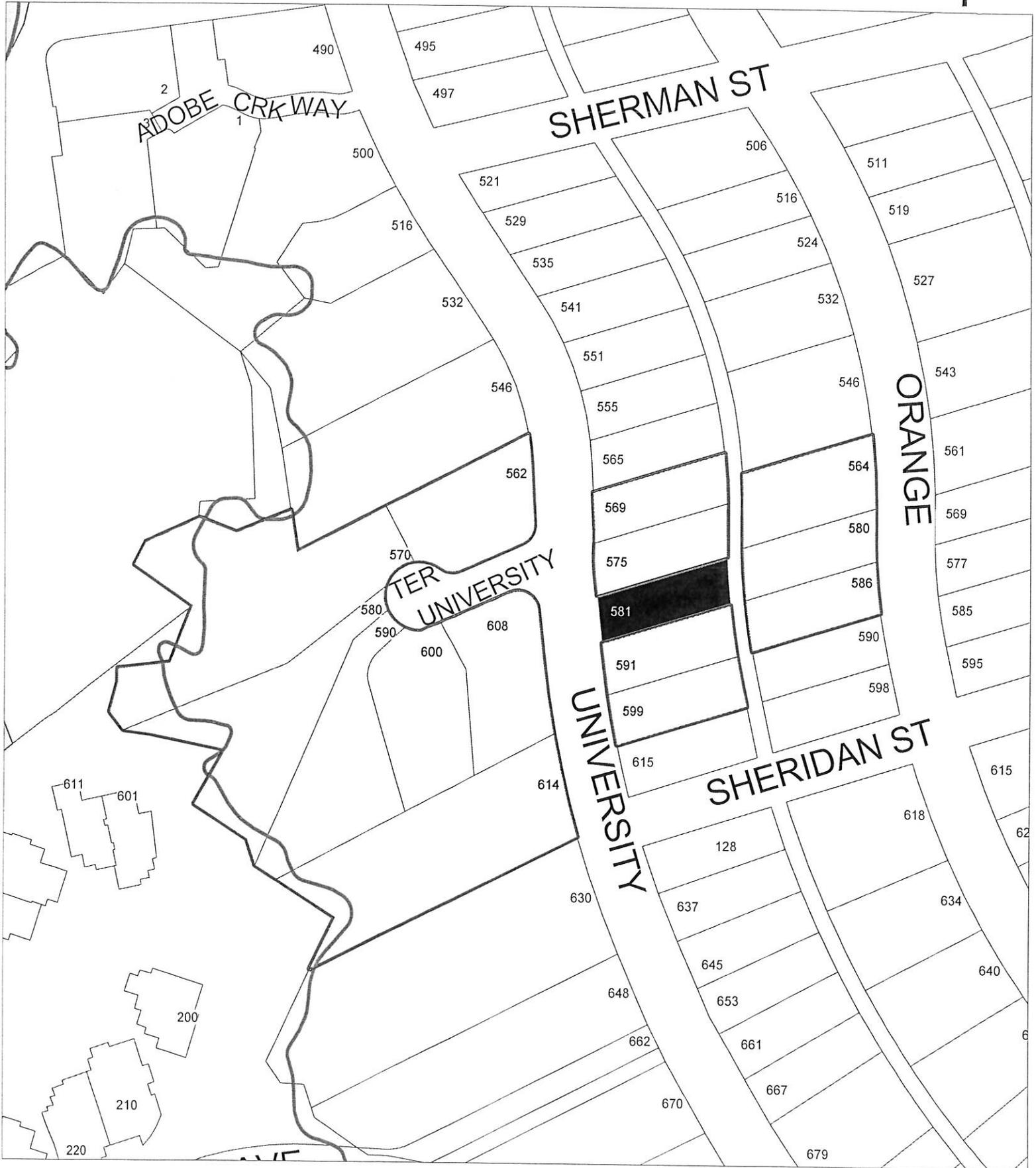
SCALE 1 : 6,000



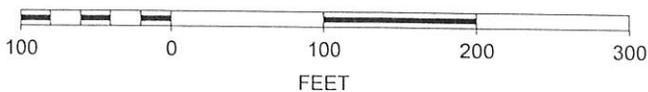
CITY OF LOS ALTOS

APPLICATION: 16-SC-08
APPLICANT: Via Builders Inc./ C. Chan
SITE ADDRESS: 581 University Avenue

581 University Avenue Notification Map

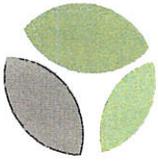


SCALE 1 : 1,500



N





urbantree**management** inc.

ATTACHMENT D

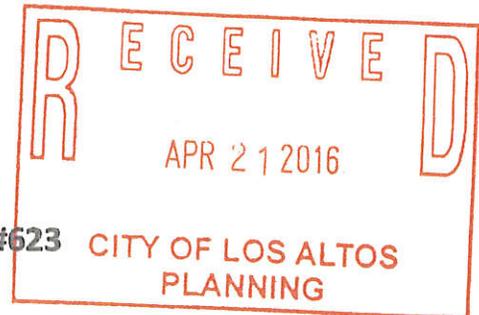
Tree Survey of
581 University Avenue,
Los Altos, CA 94022



Prepared by

Michael P. Young

Certified Arborist WC ISA #623



APN# 175-15-014:
581 University Avenue, Los Altos, CA 94022

Assignment

It was our assignment to physically examine, inventory and map trees in the survey area. We were also to write an arborist report and stand-alone tree protection report. We were to include information on whether and why a specific coast live oak (tree #2) on the property is suitable or unsuitable for retention. References include a plan set dated 3/31/16.

Summary

This survey provides a numbered map and complete and detailed information for each of the 6 trees surveyed. Four of the trees surveyed are protected under City of Los Altos tree ordinances. Two trees are located on a neighboring property and one tree is a street tree. The health of trees surveyed was rated from A (good) to B (fair/good) and their structure was rated from A (good) to F (poor). One protected tree was recommended for removal due to structure.

Contents

All the trees surveyed were examined and then rated based on their individual health and structure according to the table below. For example, a tree may be rated "good" under the health column for excellent/vigorous appearance and growth, while the same tree may be rated "fair/poor" in the structure column if structural mitigation is needed. More complete descriptions of how health and structure are rated can be found under the "Methods" section of this report. The complete list of trees and all relevant information, including their health and structure ratings, their "protected/significant" status, a map and recommendations for their care can be found in the data table that accompanies this report.

Rating	Health	Structure
A Good	excellent/vigorous	flawless
B Fair/good	healthy	very stable
C Fair	fair	routine maintenance needed such as pruning or end weight reduction as tree grows, minor structural corrections needed
D Fair/poor	declining	significant structural weakness(es), mitigation needed, mitigation may or may not preserve the tree
F Poor	dead or near dead	hazard

Methods

The trunks of the trees are measured using an arborist's diameter tape at 48" above soil grade. The canopy height and spread are estimated using visual references only. In cases of a very large tree, a standard measuring tape may be used.

The condition of each tree is assessed by visual observation only from a standing position without climbing or using aerial equipment. No invasive equipment is used. Consequently, it is possible that individual tree(s) may have internal (or underground) health problems or structural defects, which are not detectable by visual inspection. In cases where it is thought further investigation is warranted, a "full hazard assessment" is recommended. This assessment would consist of drilling or using sonar equipment to detect internal decay and may include climbing or the use of aerial equipment.

Tree Health Ratings

The health of an individual tree is rated based on leaf color and size, canopy density, new shoot growth and the absence or presence of pests or disease.

Tree Structure Ratings

Individual tree structure is rated based on the growth pattern of the tree (including whether it is leaning), the presence or absence of poor limb attachments (such as co-dominant leaders), the length and weight of limbs and the extent and location of apparent decay. Very large trees that are rated D (fair/poor for structure AND that are near structures or in an area frequently traveled by cars or people, receive an additional "Consider Removal**" notation under recommendations. This is included because structural mitigation techniques do not guarantee against structural failure, especially in very large trees. Property owners may or may not choose to remove this type of tree but should be aware that if a very large tree experiences a major structural failure, the danger to nearby people or property is significant.

Survey Area Observations and Recommendations

Observations

The property is on a small, flat lot on a residential street with residences located on either side. An alley separates the lot from those behind it. The existing home is a small, one story structure, located in the center and somewhat to the front of the lot. A garage is located on the alley behind the home. The largest tree surveyed was tree #2, a coast live oak that stands alone, behind the home, in the approximate center of the lot. This tree overhangs the home, garage and the entire rear yard. One other tree resides to the rear of the home; a smaller oak situated on the alley, on the other side of a fence from tree #2.

Tree Health

All the trees here were in A (good) to B (fair/good) with no apparent diseases or insect infestations.

Tree Structure

Proper and routine pruning is essential in maintaining trees that are structurally safe. This includes early structural pruning to reduce the number of poorly attached leaders before they become very large. Neither of the oaks on the property were pruned for structure when young. Tree #3 is 11.5 DBH coast live oak. This tree is a small to medium sized oak and structural pruning, installation of one cable and end weight reduction can significantly improve its safety. The tree is also younger and vigorous enough to heal the larger pruning cuts necessary to intervene structurally.

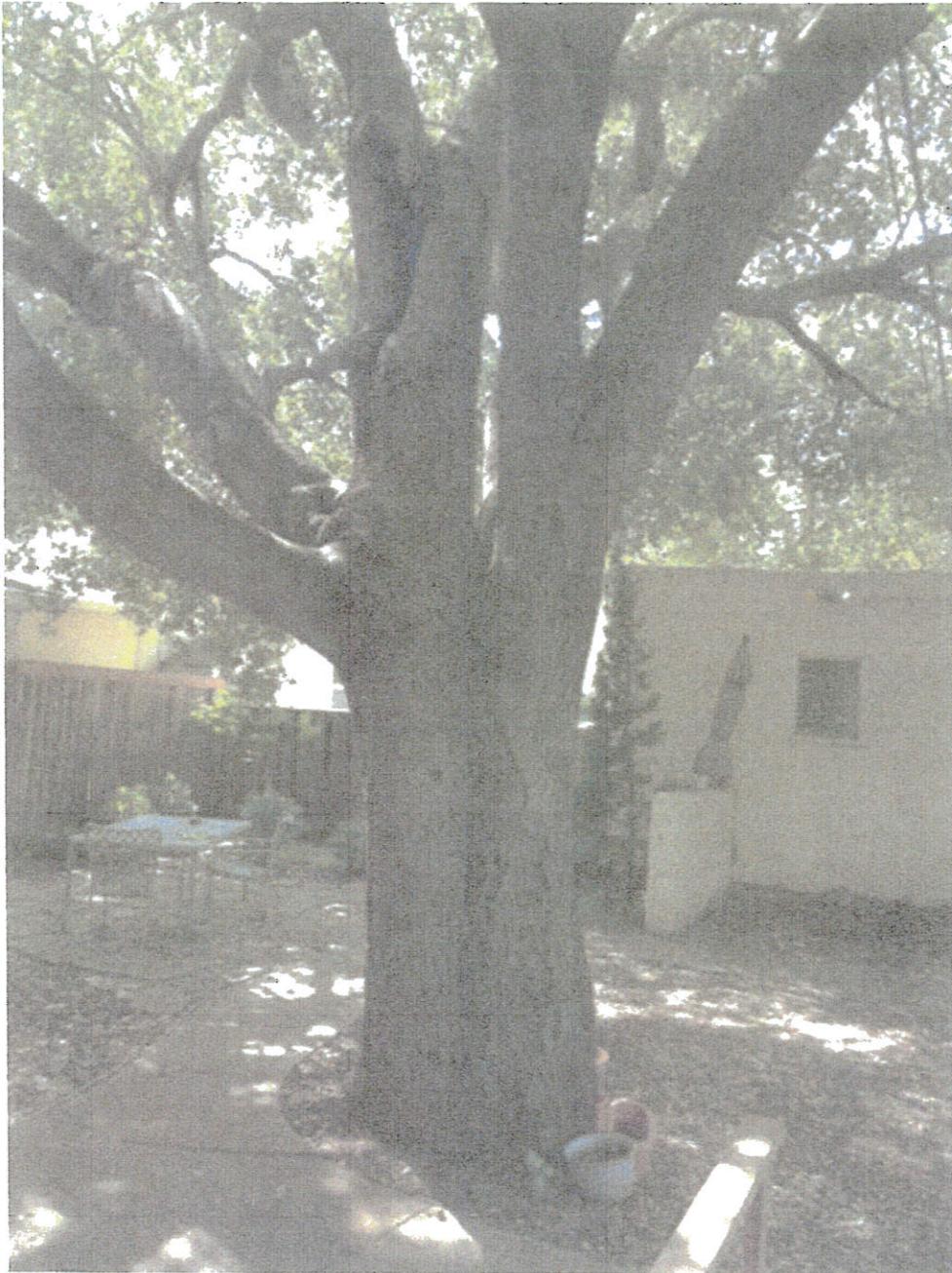
Tree #2

Like the smaller oak on the alley, this 35" DBH coast live oak tree was not pruned for structure when young. Unlike oak #3, intervention cannot now make this a reasonably safe tree. It is now a very large tree 50' wide by 36' tall, with multiple, serious structural problems. Because of these problems, there are multiple ways in which this tree could structurally fail. Due to the trees large size and its proximity to the home and yard, any failure could be catastrophic, causing significant damage to structures and serious injury or death to people nearby. This tree was rated F or poor for structure. It is hazardous and should be removed. The tree's main structural issues are pictured and described on the following pages.

Section 11.08.90 of the Los Altos Municipal Code lays out the criteria that a protected tree must meet to be removed. This tree meets the following criteria:

1. This tree or its major leaders could fail at any time due to poorly attached leaders and a large hollow. It is in close proximity to the home and garage on site and overhangs virtually all of the rear yard.
3. The lot is flat. The tree's removal will have no effect on erosion, soil retention or water drainage in the area.
7. There are no reasonable and feasible ways to ensure the safety of this tree.

Please see the pictures and descriptions that follow.

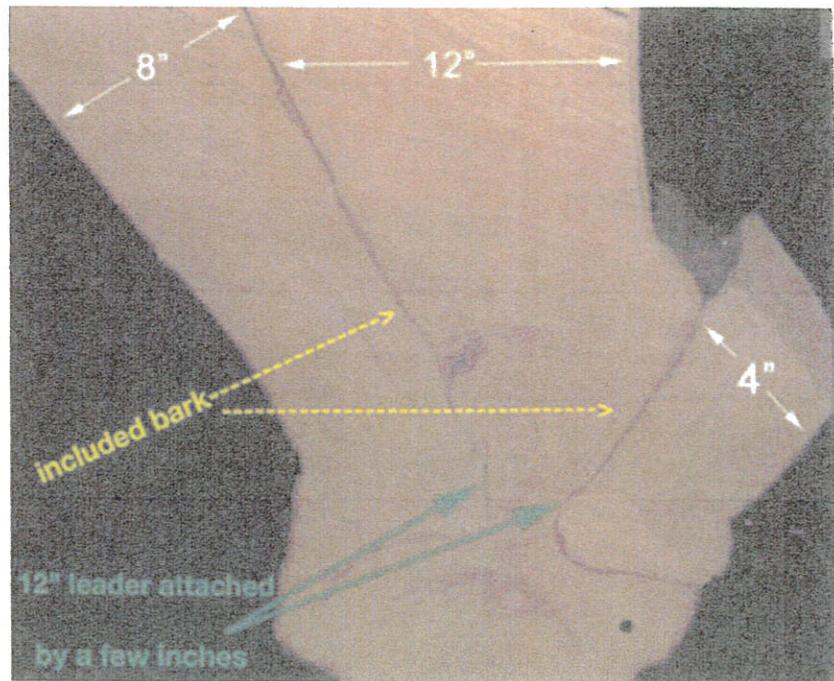


Tree #2 has multiple co-dominant leaders, clustered 8-10' above grade



The leaders are poorly attached with included bark. As these narrowly attached leaders grow, they push themselves away from each other and split apart.

An example cross section of a tree with included bark is shown to right. Included bark is bark that occurs in a crotch between branch and trunk or between co-dominant leaders. Included bark keeps the co-dominant leaders apart from each other from the point of origin, although they may look fully attached from the exterior. It occurs on defective V-shaped crotches in which the bark grows inward and on itself, causing a physical weakness where the co-dominant leaders meet.





The tree has a large hollow at 12', where a third, equally dominant, poorly attached leader split from the other leaders. The hole is about 3' long and is the heartwood (dense, non-living xylem that gives trees structural strength and stability) has rotted out of the center. The remaining outer portions of these conjoined leaders are structurally weak without the heartwood and could split from each other or break from the lower tree at any time. Failure of this portion of the tree would likely cause more leaders to fail below it as it fell.

Local Regulations Governing Trees

According to the Los Altos Municipal Code sections 11.08.040 and 9.20.020, a protected tree is any of the following:

- A. Any tree that is forty-eight (48) inches in circumference (15.27" diameter) measured at forty-eight (48) inches above grade;
- B. Any tree designated by the historical commission as a heritage tree or any tree under official consideration by the historical commission for heritage tree designation;
- C. Any tree which was required by the city to be either saved or planted in conjunction with a development review application.
- D. Street Trees

Under these regulations, four of the surveyed trees are protected. These include 1 coast live oak on the subject property, 2 redwoods on the adjacent property and 1 street tree.

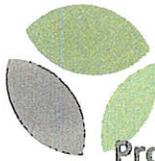
I certify that the information contained in this report is correct to the best of my knowledge and that this report was prepared in good faith. Please call me if you have questions or if I can be of further assistance.

Respectfully,

Michael P. Young

About the Arborist

Michael P. Young is a California native, graduating with honors from U.C. Berkeley. He concentrated his studies on Environmental Policy, Law and Ecology while earning his Bachelor of Science degree from the College of Natural Resources. He is a certified arborist and a state licensed contractor with more than 26 years experience managing the San Francisco Bay Area's unique landscapes. Mr. Young is a leading expert in Bay Area tree management and has advised the public on tree evaluation and tree failure during storms. He is frequently consulted by the media and as an expert in court trials. He currently serves on the Horticulture Advisory Board at Foothill College in Los Altos. He has been teaching for more than 14 years on topics that include preserving native oaks, landscape design, pruning, horticultural practices, and small business management.



Protection Plan

APN# 175-15-014:

581 University Avenue, Los Altos, CA 94022

Assignment

It was our assignment to write a stand-alone tree protection plan for the project at the above address. References include a plan set dated 3/31/16.

Summary

This tree protection plan provides a numbered diagram (page 14) and detailed information to protect 2 trees protected under the City of Los Altos Municipal Coade. A full-size diagram is also included in the plan set.

Protection of Specific Trees During Construction

Tree #4: coast redwood, 33" DBH, 24'w X 95'h. Health =B, Structure= A, TPZ = drip line or minimum 16.5' in all directions from the trunk (on the project site). Protective fencing must be placed where possible given buildings and other impediments. When the project has commenced to the point that the fencing needs to be moved back in order to provide work area and construction of approved intrusions into the TPZ, the project arborist must be on-site to supervise the moving and re-anchoring of the tree protection fencing. Any pruning needed for construction clearance must be done by a company with a certified arborist on staff.

This tree is located about 30" from the property line on the adjacent property and overhangs the subject property by about 12'. The nearest edge of the basement/shoring excavation for the home at 581 University Avenue is 7'6" from the trunk of this tree. This excavation will remove approximately 6% of the tree's roots and will not significantly impact the tree's health. Roots larger than 2" diameter must be cut off cleanly at the edge of the excavation, covered with burlap and kept moist until the excavation is backfilled. Fencing, mulching and irrigation of the tree as recommended under General Tree Protection Plan should be followed.

Tree #5: coast redwood, 3" DBH, 22'w X 100'h. Health =B, Structure= A, TPZ = drip line or minimum 15' in all directions from the trunk (on the project site). Protective fencing must be placed where possible given buildings and other impediments. When the project has commenced to the point that the fencing needs to be moved back in order to provide work area and construction of approved intrusions into the TPZ, the project arborist must be on-site to supervise the moving and re-anchoring of the tree protection fencing. Any pruning needed for construction clearance must be done by a company with a certified arborist on staff.

This tree is located about 6" from the property line on the adjacent property and overhangs the subject property by about 12'. The nearest edge of the foundation excavation for the home at 581 University Avenue is about 7' from the trunk of this tree. This excavation and the excavation needed for the parking area will impact about 14% of the tree's root zone, which will not significantly impact the tree's health. Roots larger than 2" diameter must be cut off cleanly at the edge of the excavation, covered with burlap and kept moist until the excavation is backfilled. Fencing, mulching and irrigation of the tree as recommended under General Tree Protection Plan should be followed. Please see diagram on page 14.

General Tree Protection Plan

Besides the structural issues stated earlier in this report, the trees at this site could be at risk of damage by construction or construction procedures that are common to most construction sites. These procedures may include the dumping or the stockpiling of materials over root systems; the trenching across the root zones for utilities or for landscape irrigation; or the routing of construction traffic across the root system resulting in soil compaction and root dieback. It is therefore essential that Tree Protection Fencing be used as per the Architect's drawings. In constructing underground utilities, it is essential that the location of trenches be done outside the drip lines of trees except where approved by the Arborist.

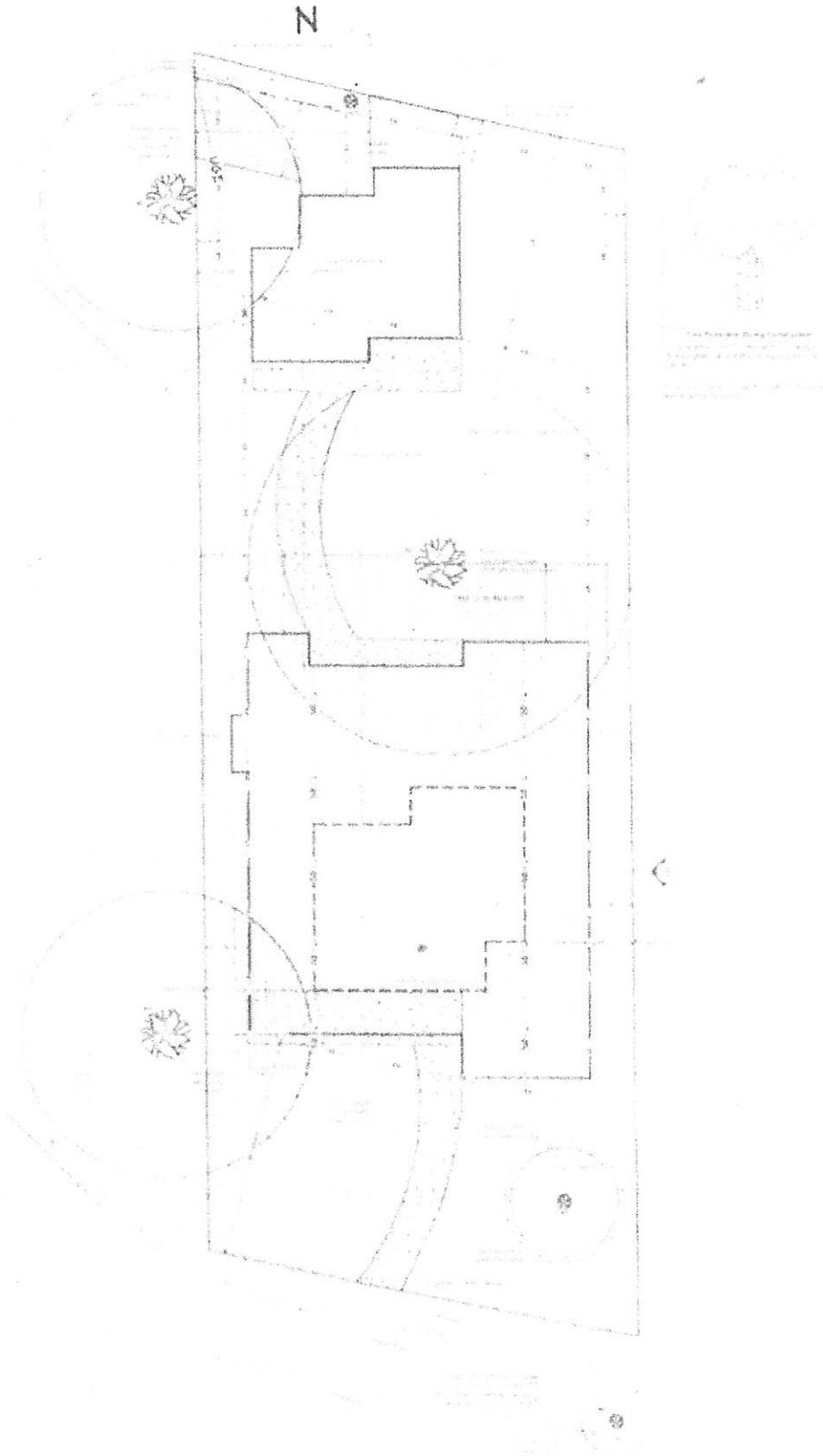
Protective fencing must protect a sufficient portion of the root zone to be effective. In most cases, it would be essential to locate the fencing a minimum radius distance of 6 times the trunk diameter in all directions from the trunk. There are areas where we will amend this distance based upon proposed construction. In my experience, the protective fencing must:

- a. Consist of chain link fencing and having a minimum height of 6 feet.
- b. Be mounted on steel posts driven approximately 2 feet into the soil.
- c. Fencing posts must be located a maximum of 10 feet on center.
- d. Protective fencing must be installed prior to the arrival of materials, vehicles, or equipment.
- e. Protective fencing must not be moved, even temporarily, and must remain in place until all construction is completed, unless approved by a certified arborist.
- f. Tree Protection Signage shall be mounted to all individual tree protection fences.

Based on the existing development and the condition and location of trees present on site, the following is recommended:

1. A Certified Arborist should supervise any excavation activities within the tree protection zone of these trees.

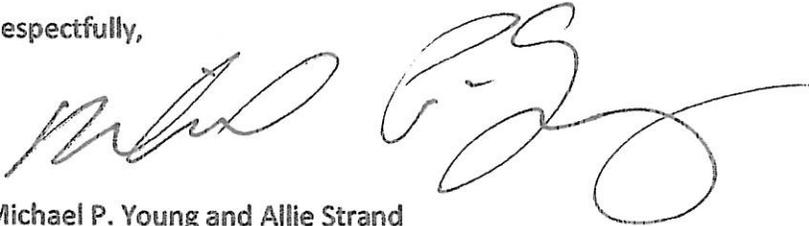
2. Any roots exposed during construction activities that are larger than 2 inches in diameter should not be cut or damaged until the project Arborist has an opportunity to assess the impact that removing these roots could have on the trees.
3. The area under the drip line of trees should be thoroughly irrigated to a soil depth of 18" every 3-4 weeks during the dry months.
4. Mulch should cover all bare soils within the tree protection fencing. This material must be 6-8 inches in depth after spreading, which must be done by hand. Course wood chips are preferred because they are organic and degrade naturally over time.
5. Loose soil and mulch must not be allowed to slide down slope to cover the root zones or the root collars of protected trees.
6. There must be no grading, trenching, or surface scraping inside the driplines of protected trees, unless specifically approved by a Certified Arborist. For trenching, this means:
 - a. Trenches for any underground utilities (gas, electricity, water, phone, TV cable, etc.) must be located outside the driplines of protected trees, unless approved by a Certified Arborist. Alternative methods of installation may be suggested.
 - b. Landscape irrigation trenches must be located a minimum distance of 10 times the trunk diameter from the trunks of protected trees unless otherwise noted and approved by the Arborist.
7. Materials must not be stored, stockpiled, dumped, or buried inside the driplines of protected trees.
8. Excavated soil must not be piled or dumped, even temporarily, inside the driplines of protected trees.
9. Landscape materials (cobble, decorative bark, stones, fencing, etc.) must not be installed directly in contact with the bark of trees because of the risk of serious disease infection.
10. Landscape irrigation systems must be designed to avoid water striking the trunks of trees, especially oak trees.
11. Any pruning must be done by a Company with an Arborist Certified by the ISA (International Society of Arboriculture) and according to ISA, Western Chapter Standards, 1998.



Tree Protection Plan Diagram - 581 University Ave, Los Altos CA

I certify that the information contained in this report is correct to the best of my knowledge and that this report was prepared in good faith. Please call me if you have questions or if I can be of further assistance.

Respectfully,

Handwritten signatures of Michael P. Young and Allie Strand. The signature on the left is for Michael P. Young and the signature on the right is for Allie Strand.

Michael P. Young and Allie Strand