

# **TUESDAY, NOVEMBER 13, 2018 – 6:00 P.M.**

Community Meeting Chambers Los Altos City Hall One North San Antonio Road, Los Altos, California

1. <u>Urban Forestry – Tree Preservation and Maintenance:</u> Receive the report on the Urban Forestry Plan and provide guidance and feedback (C. Jordan)

# **ADJOURNMENT**

#### SPECIAL NOTICES TO THE PUBLIC

In compliance with the Americans with Disabilities Act, the City of Los Altos will make reasonable arrangements to ensure accessibility to this meeting. If you need special assistance to participate in this meeting, please contact the City Clerk 72 hours prior to the meeting at (650) 947-2720.

Agendas, Staff Reports and some associated documents for City Council items may be viewed on the Internet at <a href="http://www.losaltosca.gov/citycouncil/online/index.html">http://www.losaltosca.gov/citycouncil/online/index.html</a>. Council Meetings are televised live and rebroadcast on Cable Channel 26.

On occasion the City Council may consider agenda items out of order.

All public records relating to an open session item on this agenda, which are not exempt from disclosure pursuant to the California Public Records Act, and that are distributed to a majority of the legislative body, will be available for public inspection at the Office of the City Clerk's Office, City of Los Altos, located at One North San Antonio Road, Los Altos, California at the same time that the public records are distributed or made available to the legislative body. Any draft contracts, ordinances and resolutions posted on the Internet site or distributed in advance of the Council meeting may not be the final documents approved by the City Council. Contact the City Clerk at (650) 947-2720 for the final document.

If you wish to provide written materials, please provide the City Clerk with **10 copies** of any document that you would like to submit to the City Council for the public record.

For other questions regarding the City Council meeting proceedings, please contact the City Clerk at (650) 947-2720.



#### **STUDY SESSION**

Agenda Item #1

#### AGENDA REPORT SUMMARY

Meeting Date: November 13, 2018

**Subject**: Urban Forestry – Tree Preservation and Maintenance

Prepared by: Chris Jordan, City Manager

Attachment(s):

None

**Initiated by:** City Council

**Previous Council Consideration:** 

Not Applicable

**Fiscal Impact**: Not Applicable

**Environmental Review:** 

Not Applicable

# Policy Question(s) for Council Consideration:

None at this time -- this is a study session item

# Summary:

• The City has a comprehensive urban forestry practice that includes an inventory of all trees on City-owned property; a maintenance plan for those trees, and a tree removal procedure for trees on City property and private property

#### **Staff Recommendation:**

Receive the report on the Urban Forestry Plan and provide guidance and feedback



**Subject**: Urban Forestry – Tree Preservation and Maintenance

# **Purpose**

The City Council requested information pertaining to the City's tree removal policies and procedures. This study session will cover that topic, as well as an overview of the City's tree inventory and tree maintenance plans.

#### **Background**

For the study session, City staff will provide a presentation that includes a brief summary on the following topics:

• The City tree inventory and maintenance plan: In 2017, the City hired a consultant to complete an inventory and assessment of all the trees on City-owned property and develop a maintenance plan. That report can be found at:

https://www.losaltosca.gov/sites/default/files/fileattachments/los altos community/page /36391/los altos resource analysis 20180330.pdf

- City staff will also discuss the tree removal permitting process focusing on:
  - 1) Trees on public property
  - 2) Trees on private property
  - 3) Trees on development sites

Staff has recently initiated a new noticing system for removal of trees and that will be discussed during the presentation.

• Heritage Trees: Heritage Trees are defined in the Municipal Code (11.080.010) as "any tree so designated by the historical commission, based on the finding that the tree has character, interest, or value as part of the development of, and/or exemplification of, the cultural, educational, economic, agricultural, social, indigenous, or historical heritage of the city." Staff believes that there are many trees in town that may meet this definition and would like to discuss this with the Council.

# Options/Recommendation

This a study session item. Staff welcomes the Council's feedback and guidance on this topic.



# REGULAR CITY COUNCIL MEETING TUESDAY, NOVEMBER 13, 2018 – 7:00 P.M.

Community Meeting Chambers Los Altos City Hall 1 North San Antonio Road, Los Altos, California

# **ESTABLISH QUORUM**

#### PLEDGE OF ALLEGIANCE

Presented by Junior Girl Scouts, Troop 60126

#### CHANGES TO THE ORDER OF THE AGENDA

#### PUBLIC COMMENTS ON ITEMS NOT ON THE AGENDA

Members of the audience may bring to the Council's attention any item that is not on the agenda. Please complete a "Request to Speak" form and submit it to the City Clerk. Speakers are generally given two or three minutes, at the discretion of the Mayor. Please be advised that, by law, the City Council is unable to discuss or take action on issues presented during the Public Comment Period. According to State Law (also known as "the Brown Act") items must first be noticed on the agenda before any discussion or action.

#### CONSENT CALENDAR

These items will be considered by one motion unless any member of the Council or audience wishes to remove an item for discussion. Any item removed from the Consent Calendar for discussion will be handled at the discretion of the Mayor.

- 1. <u>Council Minutes</u>: Approve the minutes of the October 9, 2018 and October 23, 2018 regular meetings (S. Henricks)
- Resolution No. 2018-41: Annual Concrete Repair, Project TS-01005: Adopt Resolution No. 2018-41 accepting completion of Annual Concrete Repair, Project TS-01005; authorize the Public Works Director to record a Notice of Completion as required by law (Z. Trabzada)
- 3. <u>Professional Services Agreement: San Antonio Road and West Portola Avenue Improvements, Project TS-01037:</u> Authorize the City Manager to execute a professional services agreement between the City of Los Altos and Kimley-Horn and Associates, Inc. in an amount not to exceed \$157,144 for design services for CIP Project TS-01037, San Antonio Road and West Portola Avenue Improvements (A. Bodduna)

# **DISCUSSION ITEMS**

- 4. <u>Update on Miramonte Avenue Path, Project CF-01006:</u> Authorize staff to continue with current design and construction of Miramonte Avenue Path, Project CF-01006 (A. Bodduna)
- 5. Proposed Five-Story, 50-Unit Multiple-Family Building at 4856 El Camino Real: Adopt Resolution No. 2018-42, which will approve Design Review application 18-D-01, Use Permit application 18-UP-01 and Subdivision application 18-SD-01 for a new 50-unit multiple-family development at 4856 El Camino Real (J. Biggs)

Jeannie Bruins	Lynette Lee Eng	Jean Mordo	Jan Pepper	Mary Prochnow
Councilmember	Vice Mayor	Mayor	Councilmember	Councilmember

# COUNCIL/STAFF REPORTS AND DIRECTIONS ON FUTURE AGENDA ITEM ADJOURNMENT

#### SPECIAL NOTICES TO THE PUBLIC

In compliance with the Americans with Disabilities Act, the City of Los Altos will make reasonable arrangements to ensure accessibility to this meeting. If you need special assistance to participate in this meeting, please contact the City Clerk 72 hours prior to the meeting at (650) 947-2720.

Agendas, Staff Reports and some associated documents for City Council items may be viewed on the Internet at <a href="http://www.losaltosca.gov/citycouncil/meetings">http://www.losaltosca.gov/citycouncil/meetings</a>. Council Meetings are televised live and rebroadcast on Cable Channel 26. On occasion the City Council may consider agenda items out of order. If you wish to provide written materials, please provide the City Clerk with 10 copies of any document that you would like to submit to the City Council for the public record.

Written comments may be submitted to the City Council at <u>council@losaltosca.gov</u>. To ensure that all members of the Council have a chance to consider all viewpoints, you are encouraged to submit written comments no later than 24 hours prior to the meeting.

All public records relating to an open session item on this agenda, which are not exempt from disclosure pursuant to the California Public Records Act, and that are distributed to a majority of the legislative body, will be available for public inspection at the Office of the City Clerk's Office, City of Los Altos, located at One North San Antonio Road, Los Altos, California at the same time that the public records are distributed or made available to the legislative body. Any draft contracts, ordinances and resolutions posted on the Internet site or distributed in advance of the Council meeting may not be the final documents approved by the City Council. Contact the City Clerk at (650) 947-2720 for the final document.

If you challenge any planning or land use decision made at this meeting in court, you may be limited to raising only those issues you or someone else raised at the public hearing held at this meeting, or in written correspondence delivered to the City Council at, or prior to, the public hearing. Please take notice that the time within which to seek judicial review of any final administrative determination reached at this meeting is governed by Section 1094.6 of the California Code of Civil Procedure.

# MINUTES OF THE REGULAR MEETING OF THE CITY COUNCIL OF THE CITY OF LOS ALTOS, HELD ON TUESDAY, OCTOBER 9, 2018, BEGINNING AT 7:00 P.M. AT LOS ALTOS CITY HALL, 1 NORTH SAN ANTONIO ROAD, LOS ALTOS, CALIFORNIA

# **ESTABLISH QUORUM**

PRESENT: Mayor Mordo, Vice Mayor Lee Eng, Councilmembers Bruins, Pepper and Prochnow

ABSENT: None

#### PLEDGE OF ALLEGIANCE

#### CHANGES TO THE ORDER OF THE AGENDA

#### PUBLIC COMMENTS ON ITEMS NOT ON THE AGENDA

Los Altos resident Bill Bassett and Mountain View resident Asim Praveen provided public comment on items not on the agenda.

#### CONSENT CALENDAR

Vice Mayor Lee Eng pulled item 4. A member of the public pulled item 5.

<u>Action:</u> Upon a motion by Councilmember Pepper, seconded by Councilmember Bruins, the Council unanimously approved the Consent Calendar, with the exception of Items 4 and 5, as follows:

- 1. Council Minutes: Approved the minutes of the September 25, 2018 regular meeting.
- 2. Parcel Map: 962 Acacia Avenue: Approved Parcel Map for 962 Acacia Avenue.
- 3. Quarterly Investment Portfolio Report Quarter ended June 30, 2018: Received the Investment Portfolio Report through June 30, 2018.
- 4. Ordinance No. 2018-450: Zoning Code Amendments regarding the disposition of City-owned property: Adopt Ordinance No. 2018-450 regarding the disposition of City-owned property with an "Other Open Space" and "Parks" land use designation pulled for discussion (see page 3).
- 5. Ordinance No. 2018-451: Cannabis Prohibition: Adopt Ordinance No. 2018-451 clarifying the prohibition of all medical and adult-use commercial cannabis activities and limit cultivation for personal use in Los Altos *pulled for discussion (see page 2)*.
- 6. Ordinance No. 2018-452: Stormwater Pollution Prevention: Adopted Ordinance No. 2018-452 amending Los Altos Municipal Code Chapter 10.16 Stormwater Pollution Prevention Measures

to reflect current stormwater pollution prevention requirements for land development projects mandated by the Regional Water Quality Control Board.

- 7. <u>Annual Concrete Repair Project, TS-01005:</u> Authorized the City Manager to execute a change order of up to \$78,308.00 utilizing remaining funds in the Annual Concrete Repair Project, TS-01005.
- 8. <u>Los Altos Village Association Tree Lighting Funding Request:</u> Approved the \$9,000 expenditure request by LAVA to be used towards the purchase of LED light strands for the trees along Main Street, State Street, and the parking plazas in Downtown Los Altos.

#### ITEM REMOVED FROM CONSENT CALENDAR

5. Ordinance No. 2018-451: Cannabis Prohibition: Adopt Ordinance No. 2018-451 clarifying the prohibition of all medical and adult-use commercial cannabis activities and limit cultivation for personal use in Los Altos

Public Comment: Los Altos resident Ken Elchert provided public comment.

<u>Action:</u> Upon a motion by Councilmember Bruins, seconded by Councilmember Pepper, the Council adopted Ordinance No. 2018-541 clarifying the prohibition of all medical and adult-use commercial cannabis activities and limit cultivation for personal use in Los Altos by the following vote: AYES: Bruins, Lee Eng, Mordo, Pepper; NOES: Prochnow; ABSTAIN: None; ABSENT: None

<u>Direction:</u> Council directed staff to craft a section to address ventilation, nuisance and odor issues and to move the amended Ordinance through the regular planning process as soon as possible. City Attorney will provide the Council with the amendment language via email prior to presenting to the Planning Commission to ensure it meets Council's expectations.

# **DISCUSSION ITEMS**

9. Stormwater Fee Report: Approve the structure of the Stormwater Fees and findings of the Stormwater Fee Report; authorize staff to work in consultation with the City Attorney and the Rate Consultant to finalize the Stormwater Fee Report with such changes deemed advisable and not altering the structure of the Stormwater Fees; adopt Resolution No. 2018-39 initiating a proceeding to obtain approval of a property-related fee conforming to Article XIII D, Section 6 of the Constitution; adopt Resolution 2018-40 adopting ballot procedures for a property related fee conforming to Article XIII D, Section 6 of the Constitution

Public Works Director Susanna Chan and Jerry Bradshaw of SCI Consulting Group presented the report.

Public Comment: Los Altos resident Neha Deysai provided public comment.

Action: Upon a motion by Councilmember Bruins, seconded by Vice Mayor Lee Eng, the Council unanimously approved the structure of the Stormwater Fees and findings of the Stormwater Fee

Report; authorized staff to work in consultation with the City Attorney and the Rate Consultant to finalize the Stormwater Fee Report with such changes deemed advisable and not altering the structure of the Stormwater Fees; adopted Resolution No. 2018-39 initiating a proceeding to obtain approval of a property-related fee conforming to Article XIII D, Section 6 of the Constitution; adopted Resolution 2018-40 adopting ballot procedures for a property related fee conforming to Article XIII D, Section 6 of the Constitution.

#### ITEM REMOVED FROM CONSENT CALENDAR

4. Ordinance No. 2018-450: Zoning Code Amendments regarding the disposition of City-owned property: Adopt Ordinance No. 2018-450 regarding the disposition of City-owned property with an "Other Open Space" and "Parks" land use designation

Vice Mayor Lee Eng expressed concerns that the Ordinance does not protect all public lands.

Action: Upon a motion by Councilmember Bruins, seconded by Councilmember Prochnow, the Council adopted Ordinance No. 2018-450 regarding the disposition of City-owned property with an "Other Open Space" and "Parks" land use designation by the following vote: AYES: Bruins, Mordo, Pepper, Prochnow; NOES: Lee Eng; ABSTAIN: None; ABSENT: None.

#### STUDY SESSION

10. Review of Floor Area Ratios: Discuss and provide direction to staff

Community Development Director Jon Biggs introduced the item.

<u>Public Comment:</u> The following individuals provided public comment: Huascar Castro from Silicon Valley at Home (SV@)Home) and Los Altos residents Anita Enander and Sue Russell.

<u>Direction</u>: City Council directed staff to coordinate a study session of the Planning Commission on Floor Area Ratios (FAR) in concert with the recommendations provided by the Downtown Buildings Committee to identify lessons learned and to have the Commission evaluate options and develop draft recommendations on the various tools that can be implemented to achieve the desired look and feel of future development in the City.

#### **INFORMATION ONLY ITEM**

- A. <u>City Manager-approved purchases between \$50,000 and \$75,000 for the period July 1 September 30, 2018</u>
- B. <u>City-owned property table</u>

<u>Direction</u>: City Council directed staff to begin the process of cleaning up parcels listed in the table that have inappropriate land use designations, designating appropriately as "Park" or "Other Open Space" and, where necessary, taking these clean-ups through the planning process.

## COUNCIL/STAFF REPORTS AND DIRECTIONS ON FUTURE AGENDA ITEMS

Councilmember Prochnow reported that she attended the Youth and Senior Commission meetings on October 1, 2018.

Vice Mayor Lee Eng reported that she attended her usual Commission meetings.

Councilmember Bruins reminded the Council that there is a Waymo Community Forum at Grant Park on October 17, 2018 from 12:30 to 2:30 p.m. She reported that she attended her usual meetings and held Open Office Hours. She further reported that the American Legion would be celebrating its 80<sup>th</sup> Anniversary in November 2018 and requested that the mayor issue a proclamation. Finally, she updated the City Council on the development of a Housing Incentive Pool (HIP) program by Metropolitan Transportation Commission (MTC).

Councilmember Pepper reported that she attended the Sierra Club *Guardians of Nature* event honoring Santa Clara County Supervisor Joe Simitian and that she moderated a League of Women Voters candidate forum for the Los Altos School District.

City Manager Jordan reminded the Council that its next meeting will be October 23, 2018 and will include joint meetings with six of the City Commissions beginning at 5:00 p.m. and a regular meeting consisting of a short Consent Calendar. He also reminded the Council that multiple closed sessions will take place beginning at 5:00 p.m. on October 30, 2018.

# **ADJOURNMENT**

Mayor Mordo adjourned the meeting at 9:18p.m.	
	Jean Mordo, MAYOR
Jon Maginot, CMC, CITY CLERK	

# MINUTES OF THE REGULAR MEETING OF THE CITY COUNCIL OF THE CITY OF LOS ALTOS, HELD ON TUESDAY, OCTOBER 23, 2018, BEGINNING AT 7:00 P.M. AT LOS ALTOS CITY HALL, 1 NORTH SAN ANTONIO ROAD, LOS ALTOS, CALIFORNIA

# **ESTABLISH QUORUM**

PRESENT: Mayor Mordo, Vice Mayor Lee Eng, Councilmembers Bruins, Pepper and Prochnow

ABSENT: None

#### PLEDGE OF ALLEGIANCE

Presented by Junior Girl Scouts, Troop 60402

#### CHANGES TO THE ORDER OF THE AGENDA

None

#### PUBLIC COMMENTS ON ITEMS NOT ON THE AGENDA

None

#### CONSENT CALENDAR

The Council continued item 1 to a future meeting.

Members of the public pulled item 2.

Vice Mayor Lee Eng pulled item 3.

1. <u>Council Minutes</u>: Approve the minutes of the October 9, 2018 study session and regular meeting to the November 13, 2018 meeting.

Continued to a future meeting.

- 2. Environmental Consulting Services for 5150 El Camino Real: Authorize the City Manager to execute a professional services agreement with David J. Powers & Associates, Inc. to provide environmental consulting services related to the development application at 5150 El Camino Real for an amount not to exceed \$111,000 pulled for discussion (see below).
- 3. <u>Los Altos Guidelines for Public Art:</u> Adopt the City of Los Altos Guidelines for Public Art *pulled for discussion (see page 2).*

# ITEMS PULLED FROM CONSENT CALENDAR

2. <u>Environmental Consulting Services for 5150 El Camino Real:</u> Authorize the City Manager to execute a professional services agreement with David J. Powers & Associates, Inc. to provide

environmental consulting services related to the development application at 5150 El Camino Real for an amount not to exceed \$111,000

<u>Public Comment:</u> The following individuals provided public comment: Los Altos residents Edith Huang, Phan Truong, Pierre Bedard, Clara Roa and Anita Enander.

Community Development Director Jon Biggs recommended the Council modify the motion to approve the funding for the initial environmental study that will lead to the appropriate additional next environmental step, for an amount not to exceed \$111,000.

Action: Upon a motion by Councilmember Bruins, seconded by Vice Mayor Lee Eng, the Council unanimously authorized the City Manager to execute a professional services agreement with David J. Powers & Associates, Inc. to provide environmental consulting services related to the development application at 5150 El Camino Real for an amount not to exceed \$111,000, with the understanding that the services are to take the project through the environmental review process and based on the findings, produce the appropriate environmental document.

3. Los Altos Guidelines for Public Art: Adopt the City of Los Altos Guidelines for Public Art

<u>Action:</u> Upon a motion by Councilmember Pepper, seconded by Councilmember Prochnow, the Council unanimously adopted the City of Los Altos Guidelines for Public Art with the direction that was provided during the October 23, 2018 joint meeting with the Public Arts Commission.

# COUNCIL/STAFF REPORTS AND DIRECTIONS ON FUTURE AGENDA ITEMS

City Manager Chris Jordan reminded the Council of the closed session scheduled for October 30, 2018, beginning at 5:00 pm and the study session and regular meeting scheduled for November 13, 2018, beginning at 6:00 pm and 7:00 pm, respectively.

# **ADJOURNMENT**

Mayor Mordo adjourned the meeting at 7:38p.m.	
	Jean Mordo, MAYOR
Jon Maginot, CMC, CITY CLERK	



#### **CONSENT CALENDAR**

Agenda Item # 2

#### AGENDA REPORT SUMMARY

Meeting Date: November 13, 2018

Subject: Resolution No. 2018-41: Annual Concrete Repair, Project TS-01005

**Prepared by:** Zubair Trabzada, Junior Engineer **Reviewed by:** Susanna Chan, Public Works Director

**Approved by**: Chris Jordan, City Manager

Attachment:

1. Resolution No. 2018-41

Initiated by:

Capital Improvement Project TS-01005

**Previous Council Consideration:** 

October 09, 2018

## Fiscal Impact:

The following table summarizes the final costs of this project:

	Project Budget for TS-01005	Final Cost for TS-01005
Construction	\$184,744	\$263,052
Printing/Advertising/Misc.	\$6,000	\$0
Inspection Fees	\$30,000	\$0
Construction Contingency (20%)	\$37,000	\$0
Total Cost	\$257,744	\$263,052
Project Budget	\$381,330	

The remaining project balance will be returned to the CIP Fund.

# **Environmental Review:**

Categorically Exempt pursuant to CEQA Section 15301 (c).

# Policy Question(s) for Council Consideration:

Not applicable

# Summary:

- Construction contract was awarded to Golden Bay Construction, Inc. on July 10, 2018
- City Council to accept the completion of the Annual Concrete Repair, Project TS-01005

#### **Staff Recommendation**:

Adopt Resolution No. 2018-41 accepting completion of Annual Concrete Repair, Project TS-01005; authorize the Public Works Director to record a Notice of Completion as required by law



Subject: Resolution No. 2018-41: Annual Concrete Repair, Project TS-01005

Purpose

Accept the completion of the Annual Concrete Repair, Project TS-01005.

# **Background**

The Capital Improvement Program (CIP) includes an annual budget for the repair of damaged or failed sections of concrete sidewalks and curbs/gutters. On July 10, 2018, City Council awarded the Annual Concrete Repair, Project TS-01005 to Golden Bay Construction, Inc. for contract amount of \$184,744 with contingency amount of \$37,000. The primary focus of project TS-01005 is the replacement of damaged sidewalks that are potential public safety hazards caused by broken or uplifted sidewalks.

#### Discussion/Analysis

Project TS-01005 was completed in accordance with the contract plan and specifications. The final cost of the construction contract with Golden Bay Construction Inc. is \$263,052 with one change order to repair additional damaged concrete sidewalks approved by City Council on October 9, 2018. All work was completed and is acceptable.

Recording of the Notice of Completion begins the 35-day lien-filing period for subcontractors and suppliers. At the end of the 35-day period, the City releases the 5% retention amount to the contractor if no liens are filed.

#### **Options**

1) Adopt Resolution No. 2018-41

**Advantages:** City can close Project TS-01005 as required by law

Disadvantages: None

2) Do not adopt Resolution No. 2018-41

**Advantages**: None

**Disadvantages**: City will not be able to release the retention back to the contractor as required

by law

#### Recommendation

The staff recommends Option 1.

#### RESOLUTION NO. 2018-41

# A RESOLUTION OF THE CITY COUNCIL OF THE CITY OF LOS ALTOS ACCEPTING COMPLETION AND DIRECTING THE PUBLIC WORKS DIRECTOR TO FILE A NOTICE OF ACCEPTANCE OF COMPLETION OF THE ANNUAL CONCRETE REPAIR PROJECT TS-01005

**WHEREAS**, the Los Altos Public Works Director has filed with the City Clerk of Los Altos an Engineer's Certificate as to the completion of all work provided to be done under and pursuant to the contract between City and Golden Bay Construction, Inc., dated by August 2, 2018; and

**WHEREAS**, it appears to the satisfaction of this City Council that work under said contract has been fully complete and done as provided in said contract and the plans and specifications therein referred to.

**NOW THEREFORE, BE IT RESOLVED**, that the City Council of the City of Los Altos hereby authorizes the following:

- 1. That acceptance of completion of said work be, and it is hereby, made and ordered.
- 2. That the Public Works Director is directed to execute and file for record with the County Recorder of the County of Santa Clara, notice of acceptance of completion thereof, as required by law.

**I HEREBY CERTIFY** that the foregoing is a true and correct copy of a Resolution passed and adopted by the City Council of the City of Los Altos at a meeting thereof on the 13<sup>th</sup> day of November 2018 by the following vote:

AYES:	
NOES:	
ABSENT:	
ABSTAIN:	
	Jean Mordo, MAYOR
Attest:	
Jon Maginot, CMC, CITY CLERK	
, , ,	



#### **CONSENT CALENDAR**

Agenda Item # 3

#### AGENDA REPORT SUMMARY

Meeting Date: November 13, 2018

Subject: Professional Services Agreement: San Antonio Road and West Portola Avenue

Improvements, Project TS-01037

**Prepared by:** Aruna Bodduna, Transportation Services Manager

Reviewed by: Susanna Chan, Public Works Director

**Approved by:** Chris Jordan, City Manager

Attachment(s):

None

Initiated by:

CIP Project TS-01037

#### **Previous Council Consideration:**

None

#### Fiscal Impact:

\$157,144 – already approved and included in the 5-year Capital Improvement Program budget.

#### **Environmental Review:**

Not applicable – Project Environmental Review will be conducted in Design Development phase of the project.

## Policy Question(s) for Council Consideration:

None

#### Summary:

- On September 6, 2018, the City released a request for proposals for engineering design services
- Upon staff review and evaluation of the proposals, Kimley-Horn and Associates, Inc. was recommended for awarding the project

#### **Staff Recommendation:**

Authorize the City Manager to execute a professional services agreement between the City of Los Altos and Kimley-Horn and Associates, Inc. in an amount not to exceed \$157,144 for design services for the CIP Project TS-01037, San Antonio Road and West Portola Avenue Improvements



Subject: Professional Services Agreement: San Antonio Road and West Portola Avenue

Improvements, Project TS-01037

#### **Purpose**

Authorize the City Manager to execute a professional services agreement between the City of Los Altos and Kimley-Horn and Associates, Inc. in an amount not to exceed \$157,144 for design services for CIP Project TS-01037 San Antonio Road and West Portola Avenue Improvements.

# **Background**

The San Antonio Road and West Portola Avenue Improvements, Project TS-01037, was included in the Fiscal Year 2016/17 Capital Improvement Program (CIP). The San Antonio Road and West Portola Avenue intersection serves as the gateway entry to both Egan Junior High School and Bullis Charter K - 8 School, North Campus. This intersection sees more active travel modes than any other intersection in the City of Los Altos. The sheer volume of bicycle/pedestrian traffic in the morning overwhelms the intersection, stopping all travel modes. Portola Avenue is identified as a suggested school route for Egan Junior High School. Need for improvements at this intersection have been identified in the Pedestrian Master Plan and Bicycle Transportation Plan. The key elements of the project include sidewalk widening from the intersection to the first school exit driveway, bulb-outs at northwest, northeast and southeast corners, adding a crosswalk on the north approach, traffic signal improvements and drainage improvements.

#### Discussion/Analysis

On September 6, 2018, City released a request for proposals for engineering design services for CIP Project TS-01037. The scope of work includes field investigation, preparation of design plans, traffic analysis, public outreach, bid support and construction support. The City received two proposals. Upon review and evaluation of the proposals, staff recommends awarding the project to Kimley-Horn and Associates, Inc. in the amount of \$157,144 based on the firm's project understanding, thoroughness of the proposal and experience with similar projects.

# **Options**

 Authorize the City Manager to execute a professional services agreement between the City of Los Altos and Kimley-Horn and Associates, Inc. in an amount not to exceed \$157,144 for design services for the CIP Project TS-01037 San Antonio Road and West Portola Avenue Improvements

Advantages: Project design and development will proceed in accordance with the schedule

presented in the CIP to be ready for summer 2019 construction

Disadvantages: None



**Subject**: Professional Services Agreement: San Antonio Road and West Portola Avenue Improvements, Project TS-01037

2) Do not authorize the execution of a professional services agreement for the design

Advantages: None

**Disadvantages**: Not authorizing the execution of the contract will result in delays to the project

# Recommendation

The staff recommends Option 1.



#### **DISCUSSION CALENDAR**

Agenda Item # 4

#### AGENDA REPORT SUMMARY

Meeting Date: November 13, 2018

**Subject**: Update on Miramonte Avenue Path, Project CF-01006

**Prepared by:** Aruna Bodduna, Transportation Services Manager

Reviewed by: Susanna Chan, Public Works Director

Approved by: Chris Jordan, City Manager

Attachment(s):

None

Initiated by:

City Council, Capital Improvement Program (CIP) Project CF-01006

**Previous Council Consideration:** 

April 12, 2016; November 14, 2017; June 12, 2018; July 10, 2018

Fiscal Impact:

\$330,000 (CIP budget) \$1,000,000 (Grant funding)

#### **Environmental Review:**

Categorically exempt

#### Policy Question(s) for Council Consideration:

 Should the City continue with current design and construction of Miramonte Avenue Path project consistent with Complete Streets Policy and meeting federal grant funding obligations?

# Summary:

- The key elements of Miramonte Avenue Path project include raised sidewalk with curb and gutter, Class II buffered bicycle lanes on both sides of the street
- City secured \$1,000,000 federal grant funding in 2017
- Currently in Caltrans approval process to request authorization for construction bid notice. Once this is received, project is ready for bid
- Federally-funded projects must comply with Metropolitan Transportation Commission's (MTC) Regional Project Delivery Policy (MTC Resolution No. 3606)
- Per MTC, agencies that do not comply with the delivery policy will be subject to limitations on programming in future years



- Council recommendation at July 10, 2018 Study Session included modifying the key project elements to include flush pedestrian pathway with horizontal separation on one side of the street, Class II bicycle lanes without buffer on the both sides of the street
- Modifying the project key elements will require redesign of the project and restart the Caltrans environmental review process required for federally funded projects
- With the proposed design revisions, the project delivery milestones cannot be met, and project would not comply with the MTC's Regional Project Delivery Policy

#### **Staff Recommendation:**

Authorize staff to continue with current design and construction of Miramonte Avenue Path, Project CF-01006



# **Purpose**

To provide update on Miramonte Avenue Path Project.

#### Background

Metropolitan Transportation Commission's (MTC) One Bay Area Grant program (OBAG) is a funding approach that aligns the Commission's investments with support for focused growth. Cities and counties can use these OBAG funds to invest in transportation categories such as transportation for livable communities, bicycle and pedestrian improvements, local streets and roads preservation, safe routes to school, and mobility management. MTC distributes OBAG funds to county Congestion Management Agencies, or CMAs, in each of the nine Bay Area counties. The CMAs are responsible for soliciting, evaluating and selecting eligible projects within their counties.

The Vehicle Emissions Reductions Based at Schools (VERBS) Program is Santa Clara County's locally programmed portion of MTC's One Bay Area Safe Routes to School program. VERBS is focused on reducing greenhouse gases by promoting walking, biking, transit, and carpooling to school, targeting grades K-12.

Federally-funded projects must comply with MTC's Regional Project Delivery Policy (MTC Resolution No. 3606). These policies include deadlines for certain delivery milestones to ensure that the region is able to deliver federally-funded projects in a timely manner. Projects that fail to meet these deadlines are subject to deprogramming by MTC. Project sponsors (cities or counties) that do not comply with the delivery policy will be subject to limitations on programming in future years.

In 2017, the City applied for and successfully secured VERBS grant funding through a competitive selection process for the construction of Miramonte Avenue Path-Phase 1 project (project limits from Covington Road to Berry Avenue) in the amount of \$1,000,000. The scope of Miramonte Avenue Path project is to install sidewalks and buffered Class II bike lanes on both sides of the street, along with improving crosswalks. This will help rechannelize traffic and enhance bicycle and pedestrian safety with improved facilities providing access to three schools and a public park within the project vicinity. The project design was developed in compliance with the Complete Streets Policy (Assembly Bill 1358, "Complete Streets Act of 2008") adopted by Council on December 8, 2015.

The staff report for this project from July 10, 2018 Study Session provides more information on the project background, outreach efforts, and criteria for selecting Phase 1 project limits for grant application. As indicated in the staff report, outreach included a special meeting of the Complete Streets Commission (then Bicycle and Pedestrian Advisory Committee) on August 24, 2016; a public meeting on January 22, 2018; and a regular meeting of the Complete Streets Commission on January 24, 2018. Project concept design presented at the August 2016 meeting included raised pathway with curb and gutter, while acknowledging impacts to on-street parking. During the parking survey conducted in 2016 and 2018, three (3) parked cars were observed during daytime and none during



evening time. It should be noted that the current project design accommodates parking in some portions along Miramonte Avenue.

At the July 10, 2018 Study Session, Councilmembers provided direction to staff to determine if the \$1,000,000 grant funding would still be available if the design is changed. Council then directed staff to explore re-designing the pathway project with the following suggested design changes:

- Embedding the curbed buffer between the pedestrian walkway and the bike path so it is flush between the two lanes and both lanes are at grade with the street;
- Removing the designated on-street parking from one side of the street;
- Removing the pedestrian walkway on the west side of the street or narrowing the bike path to provide enough space for vertical separation of the pedestrian walkway;
- Finding alternative permeable materials for the pedestrian walkway that are more permanent and require less maintenance in place of the decomposed granite;
- Suggesting alternative signals/beacons or designs for the pedestrian crosswalks in place of the Rectangular Rapid Flashing Beacons (RRFB);
- Exploring alternative traffic calming elements to enhance safety; and
- Holding a public meeting noticing every home on the Miramonte Corridor before bringing the re-design back to the City Council.

The above proposed changes would allow retaining on-street parking on one side of the street along Miramonte Avenue.

#### Discussion/Analysis

Per MTC guidelines, CMA's will manage countywide calls for projects and recommend a list of projects for adoption by the MTC Commission. As Santa Clara County's CMA, Valley Transportation Authority (VTA) is responsible approving grant project proposals within the County.

Following the July 10, 2018 study session, staff reached out to VTA to determine if the City can retain the grant funding with the following project revisions:

- Pedestrian Facilities originally planned for elevated 5-foot wide sidewalks on both sides of street, the revised proposal includes a 5-foot wide pathway on one side of the street at street level (not elevated). There will be a 18" stone swale between the pedestrian pathway and the bike lane to provide drainage and horizontal separation;
- Bike Facilities originally planned for Class II buffered bike lanes on both sides of the street, the revised proposal includes Class II bike lanes on both sides of the street. There will not be enough room for the buffer; and
- Crosswalks originally planned for a raised crosswalk with RRFB, the revised proposal includes just a raised crosswalk without RRFB.



The Miramonte Avenue Path project was programmed with \$1 million of construction funding that needed to be obligated by October 1, 2018. The proposed revisions listed above will require re-design of the project and re-submittal for Caltrans environmental review process with the new design. In doing so, the project will not meet the MTC's Regional Project Delivery Policy.

VTA recommends giving the City until January 31, 2019 to submit for funding obligation as originally scoped. If the City doesn't submit by that date or the City Council makes a formal decision not to proceed with the current scope, the City will lose \$1,000,000 grant funding and VTA will reprogram these grant funds to another agency's project.

# **Options**

1) Authorize Staff to continue with current design and construction of Miramonte Path, Project CF-01006

Advantages: Complies with Council Adopted Complete Streets Act of 2008 to provide

accommodations to all road users and meet federal grant funding obligations

**Disadvantages:** Some residents along project corridor do not support the current design

2) Consider redesign of the project and pursue future grant opportunities

**Advantages**: Concerned residents along project corridor could support a future design

**Disadvantages**: City will lose the \$1,000,000 federal funds approved for current design;

redesign will require additional City funding, and may require construction

funds if unsuccessful in securing future grants

3) Do not pursue the project and remove from City's CIP

Advantages: None

**Disadvantages:** This is not consistent with the adopted plans and policies, the project will not

be completed, and the City will lose the \$1,000,000 federal funds for not

delivering the project

#### Recommendation

Staff recommends Option 1.



#### DISCUSSION CALENDAR

Agenda Item # 5

#### AGENDA REPORT SUMMARY

Meeting Date: November 13, 2018

**Subject**: Proposed Five-Story, 50-Unit Multiple-Family Building at 4856 El Camino Real

**Prepared by:** Zachary Dahl, Planning Services Manager Reviewed by: Jon Biggs, Community Development Director

**Approved by:** Chris Jordan, City Manager

# Attachment(s):

- 1. Resolution No. 2018-42
- 2. Applicant Cover Letter
- 3. Planning Commission Meeting Minutes, September 20, 2018
- 4. Planning Commission Agenda Report, September 20, 2018
- 5. Public Correspondence
- 6. Project Design Revisions Supplemental Plans
- 7. Full Project Plans

#### Initiated by:

Applicant and Owner – Mircea Voskerician, LuxOne LLC

#### **Previous Council Consideration:**

- January 16, 2018 (City Council-Planning Commission Joint Study Session)
- May 8, 2018 (Story Pole Exemption Request)
- July 10, 2018 (Story Pole Exemption Request)

#### **Fiscal Impact**:

The project will result in the following estimated financial contributions to the City:

- Park in-Lieu Fees: \$1,775,000 (\$35,500/multiple-family dwelling unit)
- Traffic Impact Fees: \$207,950 (\$4,159/multiple-family dwelling unit)

#### **Environmental Review:**

The project is exempt from environmental review as in-fill development in accordance with Section 15332 of the California Environmental Quality Act of 1970 as amended.

# Policy Question(s) for Council Consideration:

• Is the proposal of the eight (8) affordable (below market rate) units in exchange for a density bonus, incentives, waivers and parking requirement alteration consistent with State Law and the City's Affordable Housing Ordinance?



• Does the proposal meet the required findings for design review, a use permit and subdivision per the Los Altos Municipal Code?

# Summary:

- This is a development proposal for a new five-story, multiple-family residential building with 50 condominium units, a rooftop common area and a two-level underground parking garage
- The proposal is offering two moderate-income and six very-low-income affordable housing units for sale, 28.6 percent of the Project's base density, which qualifies the project for a density bonus, incentives, waivers and a parking requirement alteration. The proposal is seeking a 75.25 percent density bonus, development incentives to allow for increased height and a reduced rear yard setback, waivers to allow for a taller elevator tower and larger area for rooftop structures, and a reduction in the minimum onsite parking requirement
- The Complete Streets Commission and the Planning Commission have reviewed the proposal at public meetings and recommend approval of the project

# Planning Commission / Staff Recommendation:

Adopt Resolution No. 2018-42, which will approve Design Review application 18-D-01, Use Permit application 18-UP-01 and Subdivision application 18-SD-01 for a new 50-unit multiple-family development at 4856 El Camino Real



#### **Purpose**

Consider the recommendation from the Planning Commission and take action on the development application, which includes design review, a use permit and a tentative map for a new five-story, 50-unit multiple-family condominium building at 4856 El Camino Real.

## Background

Site Setting

The existing site, which includes two parcels, is designated as a "Thoroughfare Commercial" land use in the General Plan and Zoned CT (Commercial Thoroughfare). The site is 31,576 square feet (0.73 acres) in size and includes an existing one-story commercial building currently occupied with office uses at 4846 El Camino Real and a two-story mixed-use building with personal service and office uses at 4856 El Camino Real. It is adjacent to commercial uses to the northwest and across El Camino Real to the northeast, and multiple-family uses to the southwest (two-story apartment buildings) and southeast (new condominiums currently under construction).

#### El Camino Real Moratorium

The project was originally scheduled for a Planning Commission study session on October 6, 2016. However, on October 4, 2016, the City Council held a special meeting to adopt an urgency ordinance to establish a temporary moratorium on development within the El Camino Real corridor. On November 15, 2016, the City Council extended the moratorium on development within the El Camino Real corridor for an additional four months in order to review the zoning regulations and design standards along El Camino Real. On March 14, 2017, the City Council extended the moratorium an additional eight months in order to continue their review of changes and updates to the zoning regulations. Subsequently, the City adopted Zoning Code amendments related to the site standards for the CT District (Ordinance No. 2017-436) and affordable housing (Ordinance No. 2017-435). On November 15, 2017, the moratorium expired and the development proposal on the project site was allowed to proceed again.

#### City Council-Planning Commission Joint Study Session

On January 16, 2018, the City Council held a joint study session with the Planning Commission to consider, among other things, a proposal from the Applicant to evaluate two alternative designs for the multiple-family project on the site. Both projects would be five-stories and similar in overall size, but one would require a density bonus over 35 percent and offer the City additional affordable units. The first proposal included 38 units with five (5) affordable units, utilizing a 35-percent density bonus with mostly two- and three-bedroom units. The second proposal included 50 units with eight (8) affordable units, utilizing a 75.25 percent density bonus with an increased number of one- and two-bedroom units and fewer three-bedroom units. Following a presentation by the Applicant and public comment, the Council and Commission discussed the proposals, with a consensus of both bodies expressing support for the higher density proposal since it would provide the City with additional



affordable units and reduce the average size of all the units in the project; thus, making them more affordable by design.

#### Planning Commission Study Session

On April 19, 2018, the Planning Commission held a study session to review and provide feedback on the project's architectural and site design. Overall, the Commission, with only four members present, expressed general support for the project design, but noted that it should consider an improved mix of exterior materials, reduce the amount of stucco used, make sure landscaping along the side property lines was shade tolerant, and consider a different mix of exterior colors. A copy of the Planning Commission study session minutes is included with the Planning Commission agenda report.

#### Complete Streets Commission

On May 23, 2018, the Complete Streets Commission held a public meeting to consider the Project. As specified by the Zoning Code, the Commission is tasked with reviewing the bicycle, pedestrian, parking and traffic elements of a development application and providing an advisory recommendation to the Planning Commission and City Council. The Commission expressed general support for the Project, but noted concern about the project increasing traffic on nearby side streets, potential parking spill-over on nearby residential streets and an increase in traffic on streets like Jordan Avenue, potentially creating an unsafe path for school kids. The Commission also expressed concern that the project's bike parking was underestimated, even though it significantly exceeded VTA's bicycle parking guidelines. Following the discussion, the Commission voted unanimously to recommend approval of the project to the Planning Commission and City Council. A copy of the Complete Streets Commission meeting minutes is included in the Planning Commission agenda report.

#### Story Pole Exemption and Installation

On May 8, 2018, the City Council held a public meeting to consider a request from the Applicant for an exemption from the City's Story Pole Policy due to safety concerns and impairment of the use of the existing structures on the site. The exemption request proposed a modified story pole plan that installed some, but not all, of the story poles required by the Policy. Following a discussion with the Applicant, the Council voted to approve the exemption request with the modified story pole plan.

On July 10, 2018, due to complications with the story pole installation, the Applicant returned to City Council and requested a full exemption from the City's Story Pole Policy. Following a discussion with the Applicant, the Council voted to deny the exemption request and directed staff to require the modified story pole plan be implemented before the project was scheduled for review by the Planning Commission.

On August 15, 2018, staff received a certification letter from the project's civil engineer verifying that the story poles had been installed per the approved plan. A copy of the certification letter and the approved story pole plan is included in the Planning Commission agenda report.



#### Planning Commission

On September 20, 2018 the Planning Commission held a public hearing to consider the Project. Following a presentation from the Applicant and project architect, Jeff Potts, and comments from one member of the public who expressed support, the Commission discussed the proposal. The Commission expressed general support for the Project, noting that the design had significantly improved to address past comments, the project plans and support information was very thorough and comprehensive, and the amount of onsite parking, bicycle parking and open space significantly exceed the minimum requirements. However, some concerns were raised regarding the mix of exterior materials, the amount of stucco that was proposed and that the number of affordable units may not justify the density bonus request. After the discussion, the Commission voted 6-1 to recommend approval of the Project with following additional recommendations:

- The exterior design should be updated to address the Planning Commission's concerns and come back to the Commission for final approval prior to submittal of a building permit;
- Consider increasing the size and/or number of bedrooms in the BMR units and modifying income levels to best meet the City's needs of for-sale BMR units;
- Add a finding that notes additional project amenities, such as parking ratio, significant amount
  of open space, bike parking, and larger side yard setback, contributed to approval of the 75%
  density bonus; and
- The Construction Management Plan should outline how construction parking impacts on the nearby neighborhood will be minimized.

The Planning Commission meeting minutes and agenda report are attached for reference (Attachments 3 and 4).

#### Discussion/Analysis

Design Revisions

In response to the comments made by the Planning Commission, the Applicant made the following revisions to the Project:

- The size of the smallest one-bedroom affordable unit was increased by replacing unit 502, a 782 square-foot unit on the fifth floor, with unit 311, a 902 square-foot unit on the third floor;
- All foam window trim was removed, and the windows were recessed into the wall plane;
- The board formed concrete façade on the planters and lower walls was revised to be clad with tan/brown Equitone, a cement panel exterior cladding material, to improve the building's aesthetic and be more compatible with the other exterior materials;
- The Equitone cladding was also used to replace some of the stucco walls to reduce the amount of stucco used on the building;



• The front entrance façade was revised to improve the design composition and breakup the appearance of it being a large glass storefront; and

 The design of the upper floor of the building was revised to include additional transom windows and lighter elements to avoid any perception of excessive bulk at the top of the building.

The applicant's cover letter (Attachment 2) provides additional information about the project revisions and the Supplemental Plans (Attachment 6) illustrate how the changes will be incorporated into the project. The full set of plans reviewed by the Planning Commission is included as Attachment 7.

#### Planning Commission Recommendations

To address the recommendations from the Planning Commission, Resolution No. 2018-42 has been updated to include a finding that notes the additional project amenities, such as parking ratio, significant amount of open space, bike parking, and larger side yard setback, contribute to approval of the 75.25 percent density bonus, and the Constriction Management Plan condition (No. 27) has been updated to ensure that construction vehicle parking will be managed to minimize impacts on nearby single-family neighborhoods.

With regard to increasing the size and/or number of bedrooms in the affordable units and modifying income levels to best meet the City's needs of for-sale affordable units, the applicant has upgraded the size of one of the one-bedroom affordable units. However, beyond that, it is up to the Council to determine if the proposed number, size and bedroom mix of affordable units is appropriate to support the density bonus request.

With regard to the Commission's recommendation that the exterior design should be updated to address their concerns and come back to the Commission for final approval prior to submittal of a building permit, the applicant has updated the exterior design of the project in an attempt to address the Commission's concerns. The Council should determine whether the design revisions are sufficient to address the issues raised by the Commission or if the project should be conditioned to go back to the Planning Commission for final exterior design approval. If the project is directed to go back to the Commission for final exterior design approval, the Council should provide direction on what exterior elements should be revised or updated.

#### Affordable Housing - Density Bonus and Development Incentives

The project exceeds the City's affordable housing regulations by providing eight (8) affordable housing units, where three (3) are required. Chapter 14.28 of the Municipal Code requires at least 10 percent of the units be affordable at the moderate and low/very-low income levels<sup>1</sup>. Since the base density for

<sup>&</sup>lt;sup>1</sup> Because the project application was deemed complete on June 8, 2018, it is not subject to the City's recently adopted 15 percent affordable housing requirement, which went into effect on October 26, 2018.



the project is 28 dwelling units, the project must provide 2.8 (rounded up to three) affordable units. By providing two (2) moderate income units and one (1) very-low income unit, the project is in compliance with the City's Affordable Housing Ordinance.

Housing Element program 4.3.2 requires that affordable housing units generally reflect the size and number of bedrooms of the market rate units. In this case, the overall project is proposing nine (9) one-bedroom units, 30 two-bedroom units and 11 three-bedroom units. Of this unit mix, one (1) three-bedroom unit is designated affordable at the moderate income level, one (1) two-bedroom unit is proposed at the moderate income level and six (6) one-bedroom units are proposed at the very-low income level. While the mix of affordable units incorporates a larger number of one-bedroom units than the average of the market rate units, given the high percentage of overall affordable units proposed, it appears that this mix of affordable housing meets the intent of the program. However, as noted above, the Planning Commission recommended that the Council consider increasing the size and/or bedrooms in the affordable units and modifying income levels to best meet the City's needs of for-sale affordable units.

Under the State's density bonus regulations (Section 65915 of the California Government Code) and the City's Affordable Housing Ordinance (Zoning Code Chapter 14.28), the project qualifies for a density bonus if it provides at least five percent very-low income units. With six (6) affordable units at the very-low income level and two (2) affordable units at the moderate level, the project is providing a total of 28.6 percent of its base density as affordable, with 21.4 percent of the units affordable at the very-low income level. Since providing 11 percent very-low income units would entitle the project to receive a 35 percent density bonus, staff believes it is reasonable to consider affording a project such as this, with a substantially higher percentage of very-low income units, with a density bonus that exceeds the maximum the City would be required to allow under State law or the City's Affordable Housing Ordinance. Both State law and the City's Ordinance allow for the City to grant a density bonus over 35 percent if an appropriate number of additional affordable units are proposed. In this case, the Applicant is seeking a density bonus of 75.25 percent in exchange for the above-mentioned mix of affordable units. Specifically, Los Altos Municipal Code Section 14.28.040(E)(7) provides for "optional density bonuses," allowing the City to grant a density bonus greater than the percentage the project is entitled to as of right. The granting of the density bonus is further supported by the fact that the project is exceeding the minimum thresholds prescribed by the Zoning Code regarding onsite parking, side yard setbacks, open space (both private and common), and bicycle parking. Information to support the density bonus request is provided in the Applicant's Density Bonus Report, which is included in the Planning Commission agenda report.

In addition to the density bonus, since the project is providing more than 15 percent of its units as affordable at the very-low income level, it qualifies for three development incentives per State law and City Ordinance. To help guide incentives requested by developers and ensure that the incentives do not result in any adverse impacts, the City adopted a list of on-menu incentives or concessions.



However, per State law and City Ordinance, a project may still request any incentive or concession that the applicant deems appropriate in exchange for the affordable units being provided (off-menu). In this case, the applicant is seeking a height incentive to allow the project to exceed the maximum height limit of 45-feet by 13-feet (off-menu) and to reduce the rear yard setback incentive for the upper floors of the building from 100 feet to 60 feet. Because the rear yard setback is being reduced by 40 percent, the request constitutes two on-menu (20 percent reduction) incentives.

The project is also seeking two waivers, which are considered more minor in nature, are necessary to construct the project and do not require use of an incentive or concession. In this case, the project is seeking a waiver for the height of its elevator tower to go beyond the 12-foot limit since there are no elevators commercially available that can comply with the 12-foot height limit for a building of this height. The project is also seeking a waiver to allow the size of the rooftop structures that enclose the elevator, stairways and trash chutes to exceed the maximum four percent threshold by 0.6 percent. Both of these waiver requests appear appropriate and reasonable for a project of this size and scope.

The project also qualifies for a parking requirement alteration per the City's Affordable Housing Ordinance. For projects that qualify for a density bonus, the minimum parking requirement, inclusive of handicapped and guest parking, shall be one onsite parking space for each one-bedroom unit and two onsite parking spaces for each two- or three-bedroom unit, if requested by the applicant. Since the project is providing 108 onsite parking spaces, where a minimum of 91 onsite parking spaces is required, it is exceeding the minimum permitted by the Code.

Under State law and City Ordinance, the City must give deference to the Applicant on granting the requested incentives and waivers unless it can make one or more of the following findings:

- The concession or incentive does not result in identifiable and actual cost reductions, consistent with the definition of "concession" or "incentive," to provide for affordable housing costs, as defined in Health & Safety Section 50052.5, or for rents for the targeted units to be set as specified in subsection (I);
- The concession or incentive would have a specific, adverse impact upon public health and safety or the physical environment or on any real property that is listed in the California Register of Historical Resources and for which there is no feasible method to satisfactorily mitigate or avoid the specific, adverse impact without rendering the development unaffordable to low-income and moderate-income households; or
- The concession or incentive would be contrary to state or federal law.

A Density Bonus Report that supports the density bonus and development incentive requests was prepared by the Applicant and is included as an attachment in the Planning Commission agenda report (Attachment 4).



For reference, the moderate income housing units would be limited in cost to be affordable to a household that makes no more than 120 percent of the County's median income and the very-low income housing units would be limited in cost to be affordable to a household that makes no more than 50 percent of the County's median income. The County's 2018 median income for a family of four is \$125,200 per HCD calculations.

#### Environmental Review

The project site, which is 0.73 acres in size, is considered a small in-fill site that is substantially surrounded by urban uses and does not contain significant natural habitat for endangered species. The development proposal is consistent with the General Plan and Zoning Ordinance, does not result in any significant effects related to traffic, noise, air or water quality, and is adequately served by all required utilities and public services. Therefore, in accordance with Section 15332 of the California Environmental Quality Act (CEQA) Guidelines the project is exempt from further environmental review.

With regard to traffic, Implementation Program C8 in the General Plan's Circulation Element requires a transportation impact analysis (TIA) for projects that result in 50 or more net new daily trips. As outlined in the project's traffic report prepared by Hexagon Transportation Consultants (included in the Planning Commission agenda report, Attachment 4), the proposed project will generate 272 average daily trips as compared with the property's existing uses, which include a mix of office and personal service uses, that generate 228 average daily trips. Since the net increase is only 44 average daily trips, a full TIA is not required for this project.

With regard to air quality, since the project is located on a State Highway, the project could potentially expose long-term residents to air pollution and the project's construction has the potential to create short-term air pollution impacts. To address these potential impacts, an air quality and greenhouse gas emission assessment was prepared for the project by Illingworth & Rodkin (included in the Planning Commission agenda report, Attachment 4). The assessment provides appropriate mitigation measures for controlling dust and exhaust during construction, air filtration for the dwellings, and construction equipment emission guidelines. The report's recommended mitigations are included as conditions of approval. With regard to greenhouse gas emissions, the project does not exceed any of the significant thresholds as specified by the Bay Area Quality Management District's Clean Air Plan, so no mitigation measures are required. The applicant has also completed the City's Climate Action Plan checklist for new development (included in the Planning Commission agenda report, Attachment 4) and will be complying with all applicable requirements to ensure that the project support's the City's greenhouse gas emission reduction targets.

Regarding noise, due to the site's proximity to a State Highway, the project is located in an area that may expose its residents to higher noise levels and the project's rooftop mechanical equipment may generate off-site noise levels that exceed thresholds established in the City's Noise Control Ordinance.



To address these potential noise impacts, a noise study was prepared by Wilson Ihrig (included in the Planning Commission agenda report, Attachment 4). To ensure that there are no significant noise impacts, the study recommends mitigation measures that specify certain types of exterior glazing, exterior wall construction and supplemental ventilation, and rooftop mechanical equipment noise controls so that the noise levels do not exceed City standards. Appropriate conditions of approval to ensure that the project is designed to comply with the noise study mitigation measures are included.

To evaluate potential tree impacts, an arborist report was prepared by Kielty Arborist Services (included in the Planning Commission agenda report, Attachment 4). The arborist report evaluated the condition of 13 existing trees on the site and along its El Camino Real frontage and provided tree protection measures for the trees that are proposed to remain. All significant trees on the site, which include the nine (9) mature redwood trees along the rear property line, are proposed to remain and are identified as being in good health. Four smaller trees, three of which are along El Camino Real, are proposed for removal. The tree protection measures for the redwood trees along the rear have been appropriately incorporated in the conditions of approval.

Overall, as documented above, the project's technical studies support the finding that the project meets the criteria and conditions to qualify as an in-fill development project that is exempt from further environmental review.

#### Public Contact and Correspondence

For this meeting and the Planning Commission public hearing, public meeting notices were mailed to the 154 property owners, business and residential tenants within 500 feet of the site. A public notice billboard with color renderings was installed along the project's El Camino Real frontage and story poles to represent the corners of the building and the elevator tower, as approved by the City Council (see discussion above) were installed.

In addition to the required public notification, the applicant has conducted specific outreach to the owners of the directly adjacent properties, the tenants in the apartment buildings to the rear and the owners of the Los Altos Square Townhomes to the south and west of the project. To-date, staff has not received any correspondence from any nearby property owners or tenants regarding this prospect. However, staff has received a letter of support for the project from Carl Guardino with the Silicon Valley Leadership Group (Attachment 5).

#### City Council Action

The necessary findings related to the project's environmental review, design review, use permit, subdivision and affordable housing/density bonus applications to approve the project are contained in Exhibit A of the Resolution, and appropriate conditions to ensure the project is properly implemented are contained in Exhibit B. Based on the information contained in this report, the options for City Council action are listed below.



# **Options**

1) Approve Resolution No. 2018-42

**Advantages:** The project will replace an underdeveloped commercial property with a high-

quality residential development that helps the City meet its goals for producing

new housing units, both affordable and market rate

**Disadvantages**: Some existing commercial and office uses will be displaced

2) Do not approve Resolution No. 2018-42

**Advantages**: The existing commercial and office uses will be maintained

**Disadvantages**: The City will not make any progress on achieving its goals for the production

of new housing units

#### Recommendation

The Planning Commission and staff recommend Option 1.

#### RESOLUTION NO. 2018-42

A RESOLUTION OF THE CITY COUNCIL OF THE CITY OF LOS ALTOS MAKING FINDINGS, ADOPTING AN EXEMPTION UNDER THE CALIFORNIA ENVIRONMENTAL QUALITY ACT, AND APPROVING THE DESIGN REVIEW, USE PERMIT AND SUBDIVISION APPLICATIONS FOR A NEW 50-UNIT MULTI-FAMILY PROJECT AT 4856 EL CAMINO REAL

**WHEREAS,** the City of Los Altos received a development application from Mircea Voskerician, LuxOne LLC (Applicant), for a new 50-unit multiple-family residential building at 4846 and 4856 El Camino Real that includes Design Review 18-D-01, Use Permit 18-UP-01 and Subdivision 18-SD-01, referred to herein as the "Project"; and

WHEREAS, said Project is located in the CT District, which allows multiple-family housing as a conditional use at a maximum density of 38 dwelling units per net acre of land; and

**WHEREAS,** said Project has a net site area of 0.72 acres (31,576 square feet), which will allow for a base residential density of 28 dwelling units; and

**WHEREAS,** the Applicant is offering two moderate-income and six very-low-income affordable housing units for sale as part of the Project; and

WHEREAS, the Applicant's proposed unit mix would consist of 28.6 percent of its base density as affordable units, with 21.4 percent of the units affordable at the very low income level, thereby entitling the project to receive density bonuses and qualifying for incentives, concessions and waivers pursuant to Los Altos Municipal Code Section 14.28.040 and Government Code Section 65915, et seq.; and

**WHEREAS,** the Applicant is seeking incentives under Government Code Section 65915(e) and Los Altos Municipal Code Section 14.28.040(F) to allow: a) a building with a primary height of 58 feet and a height of 35 feet for the rear portion, where the Code allows for 45 feet and 30 feet, respectively; and b) a rear yard setback of 60 feet for the five-story portion of the building, where the Code requires a rear yard setback of 100 feet; and

**WHEREAS,** the Applicant is seeking further waivers under Government Code Section 65915(e) and Los Altos Municipal Code Section 14.28.040(H) to allow: a) the elevator tower to be 17.9 feet above the roof, where the Code allows such structures to be 12 feet above the roof; and b) enclosed roof top structures at 4.6 percent of the roof area, where the Code limits such structures to four percent of the roof area; and

WHEREAS, the Applicant is seeking a parking requirement alteration under Government Code Section 65915(e) and Los Altos Municipal Code Section 14.28.040(G) to allow for a reduction in the minimum onsite parking requirement; and

WHEREAS, the Applicant is seeking a 75.25 percent density bonus and the above-described incentives and waivers to allow development of the Project pursuant to Government Code 65915 and Los Altos Municipal Code Section 14.28.040(E)(7), which allows the City to grant a density bonus

greater than the 35 percent provided as of right for projects providing more than 11 percent of its units as affordable at the very-low income level; and

WHEREAS, said Project is exempt from environmental review as in-fill development in accordance with Section 15332 of the California Environmental Quality Act of 1970 as amended ("CEQA"); and

**WHEREAS**, said Project has been processed in accordance with the applicable provisions of the California Government Code and the Los Altos Municipal Code; and

**WHEREAS**, on May 23, 2018, the Complete Streets Commission held a public meeting on the Project and at the conclusion of the meeting voted to recommend approval to the Planning Commission and City Council; and

**WHEREAS**, on August 14, 2018 the Applicant installed story poles on the site per the modified story pole plan that was approved by the City Council on May 8, 2018; and

**WHEREAS,** on September 4, 2018 the City gave public notice of the Planning Commission's public hearing on the proposed Project by advertisement in a newspaper of general circulation and to all property owners within a 500-foot radius; and

**WHEREAS,** on September 20, 2018, the Planning Commission conducted a duly-noticed public hearing at which members of the public were afforded an opportunity to comment upon the Project, and at the conclusion of the hearing, the Planning Commission recommended that the City Council approve the Project; and

**WHEREAS,** on November 13, 2018, the City Council held a duly noticed public meeting as prescribed by law and considered public testimony and evidence and recommendations presented by staff related to the Project; and

**WHEREAS,** all the requirements of the Public Resources Code, the State CEQA Guidelines, and the regulations and policies of the City of Los Altos have been satisfied or complied with by the City in connection with the Project; and

**WHEREAS,** the findings and conclusions made by the City Council in this Resolution are based upon the oral and written evidence presented as well as the entirety of the administrative record for the proposed Project, which is incorporated herein by this reference. The findings are not based solely on the information provided in this Resolution; and

WHEREAS, all other legal prerequisites to the adoption of this Resolution have occurred.

**NOW THEREFORE, BE IT RESOLVED**, that the City Council of the City of Los Altos hereby approves the Project subject to the findings and the conditions of approval attached hereto as "Exhibit A" and "Exhibit B," and incorporated by this reference.

<b>I HEREBY CERTIFY</b> that the foregoing is a true and c adopted by the City Council of the City of Los Altos at a meet 2018 by the following vote:	
AYES:	
NOES:	
ABSENT:	
ABSTAIN:	
	Jean Mordo, MAYOR
Attest:	
Jon Maginot, CMC, CITY CLERK	

### EXHIBIT A

#### **FINDINGS**

- 1. ENVIRONMENTAL REVIEW FINDINGS. With regard to environmental review, in accordance with Section 15332 of the California Environmental Quality Act Guidelines, based on the whole record before it, including, without limitation, the analysis and conclusions set forth in the staff reports, testimony provided at the proposed Project's public hearings, and the supporting technical studies, which include: 1) a Traffic Analysis by Hexagon Transportation Consultants (May 2018); 2) an Air Quality and Greenhouse Gas Emissions Assessment (March 2018); 3) a Noise Study by Wilson Ihrig (March 2018); and 4) an Arborist Report by Kielty Arborist Services (April 2018), the City Council finds and determines that the following Categorical Exemption findings can be made:
  - a. The Project is consistent with the applicable General Plan designation and all applicable General Plan policies as well as with the applicable zoning designation (Commercial Thoroughfare) and regulations, including density bonus, incentives and waivers for the production of affordable housing;
  - b. The Project occurs within City limits on a site of no more than five acres that is substantially surrounded by urban uses and there is no record that the site has value as habitat for endangered, rare or threatened species;
  - c. Approval of the Project will not result in any significant effects relating to traffic, noise, air quality, or water quality and the completed technical studies and staff analysis contained in the agenda report support this conclusion; and
  - d. The Project has been reviewed and it is found that the site can be adequately served by all required utilities and public services.
- 2. DESIGN REVIEW FINDINGS. With regard to Design Review Application 18-D-01, the City Council finds, in accordance with Section 14.76.060 of the Los Altos Municipal Code, as follows:
  - a. The Project meets the goals, policies and objectives of the General Plan with its level of intensity and residential density within the El Camino Real corridor, and all Zoning Code site standards and design criteria applicable for a project in the CT District;
  - b. The Project has architectural integrity and has an appropriate relationship with other structures in the immediate area in terms of height, bulk and design because the project utilizes high quality materials that support its architectural style and is appropriately articulated and scaled to relate to the larger buildings on the El Camino Real corridor;
  - c. Building mass is articulated to relate to the human scale, both horizontally and vertically as evidenced in the design of the projecting overhangs, bay windows and balconies, the building elevations have variation and depth and avoid large blank wall surfaces, and the project has incorporated elements that signal habitation, such as identifiable entrances, overhangs, bay windows and balconies;

- d. The Project's exterior materials and finishes convey high quality, integrity, permanence and durability, and materials are used effectively to define building elements. Materials, finishes, and colors have been used in a manner that serves to reduce the perceived appearance of height, bulk and mass, and are harmonious with other structures in the immediate area.
- e. Landscaping such as the large specimen coral bark maple trees, Brisbane box street trees, Saratoga laurel evergreen screening trees, hedges and groundcover is generous and inviting, and landscape and hardscape features such as the custom paver walkway, board formed concrete planters and wood privacy fences are designed to complement the building and parking areas and to be integrated with the building architecture and the surrounding streetscape. Landscaping includes substantial street tree canopy including four new street trees in the public right-of-way, four new specimen coral bark maple trees in the front yard space and 11 new trees along the site perimeter;
- f. Signage, which is limited to the building address number and other required directional signage, will be designed to complement the building architecture in terms of style, materials, colors and proportions;
- g. Mechanical equipment is screened from public view by the building parapet and is designed to be consistent with the building architecture in form, material and detailing; and
- h. Service, trash and utility areas are screened from public view by their locations in the building garage and behind fencing in the side yards, and consistent with the building architecture in materials and detailing.
- 3. USE PERMIT FINDINGS. With regard to Use Permit 18-UP-01, the City Council finds, in accordance with Section 14.80.060 of the Municipal Code, as follows:
  - a. The proposed location of the multiple-family residential use is desirable and essential to the public comfort, convenience, prosperity, and welfare in that there are a limited number of sites that can accommodate new housing, the CT District has anticipated and planned for new housing along the El Camino Real corridor and the project provides housing at a variety of affordability levels;
  - b. That the proposed location of the multiple-family residential use is in accordance with the objectives of the Zoning Code since the project provides for community growth along sound lines, it is harmonious and convenient in relation to the surrounding land uses, it does not create any significant traffic impacts, it will help the City meet its affordable housing goals, it will protect and enhance property values and it will enhance the City's distinctive character with a high-quality building design in a commercial thoroughfare context;
  - c. That the proposed location of the multiple-family residential use, under the circumstances of the particular case and as conditioned, will not be detrimental to the health, safety, comfort, convenience, prosperity, or welfare of persons residing or working in the vicinity or injurious to property or improvements in the vicinity; and
  - d. That the proposed multiple-family residential use complies with the regulations prescribed for the CT District and the general provisions contained in Chapter 14.02.

- 4. SUBDIVISION FINDINGS. With regard to Subdivision 18-SD-01, the City Council finds, in accordance with Section 66474 of the Subdivision Map Act of the State of California, as follows:
  - a. The proposed condominium subdivision is consistent with the General Plan;
  - b. The Project site is physically suitable for this type and density of development in that the project meets all applicable Zoning requirements except where a density bonus and development incentives have been granted;
  - c. The design of the condominium subdivision and the proposed improvements are not likely to cause substantial environmental damage, or substantially injure fish or wildlife; and no evidence of such has been presented;
  - d. The design of the condominium subdivision is not likely to cause any serious public health problems because conditions have been added to address noise, air quality and life safety concerns; and
  - e. The design of the condominium subdivision will not conflict with any public access easements as none have been found or identified on this site.
- 5. AFFORDABLE HOUSING AND DENSITY BONUS FINDINGS. With regard to the offered below market rate units and requested density bonus, incentives, waivers and parking requirement alteration, the City Council finds, in accordance with Los Altos Municipal Code Section 14.28.040, as follows:
  - a. The applicant is offering two moderate-income and six very-low-income affordable housing units for sale, 28.6 percent of the Project's base density, which qualifies the project for a density bonus, incentives, waivers and a parking requirement alteration;
  - b. Per Table DB 3 in Section 14.28.040(C)(1)(b), a project that offers 11 percent or more of its total units (base density) as very-low income restricted affordable units shall be granted a density bonus of 35 percent, and per Table DB 4 in Section 14.28.040(C)(1)(b), a project that offers 15 percent or more of its total units (base density) as Very Low income restricted affordable units shall be granted three (3) incentives. Since the project is providing 21.4 percent of its total units as affordable at the very-low income level, the City shall grant a density bonus of at least 35 percent and three (3) incentives;
  - c. For its incentives, the project is requesting the City allow: a) a building with a primary height of 58 feet and a height of 35 feet for the rear portion, where the Code allows for 45 feet and 30 feet, respectively; and b) a rear yard setback of 60 feet for the five-story portion of the building, where the Code requires a rear yard setback of 100 feet. The height incentive is considered an "off-menu" incentive and the rear yard setback incentive is considered two (2) "on-menu" incentives (20 percent decrease in a setback);
  - d. Per Section 14.28.040(G)(2)(a), the City shall allow a minimum parking requirement, inclusive of handicapped and guest parking, of one (1) onsite parking space for each one-bedroom unit and two (2) onsite parking spaces for each two- or three-bedroom unit if requested by the

- applicant. Since the project is providing 108 onsite parking spaces, where a minimum of 91 onsite parking spaces is required, it is exceeding the minimum permitted by the Code;
- e. Per Section 14.28.040(H)(1), a project can request a waiver or reduction of development standards that have the effect of physically precluding the construction of a development in addition to the density bonus and incentives permitted by the Code. Consistent with these requirements, the Applicant is seeking waivers to allow: a) the elevator tower to be 17.9 feet above the roof, where the Code allows such structures to be 12 feet above the roof; and b) enclosed roof top structures at 4.6 percent of the roof area, where the Code limits such structures to four percent of the roof area. The basis to grant the waivers is supported by the fact that they are required in order to provide the necessary amenities and accessibility for a building of this size and density, they will not have a specific, adverse impact upon health, safety, or the physical environment, they will not have an adverse impact on any listed historic resources and will not be contrary to state or federal law; and
- f. Per Section 14.28.040(E)(7), the City is permitted to grant a density bonus greater than the 35 percent. Per consultation with City staff, the City Council and Planning Commission, the Applicant is requesting a 75.25 percent density bonus, which will allow for the development of 50 dwelling units in the project. Granting of this density bonus is supported by the fact that the project is offering of 28.6 percent of its total units as affordable at the moderate and very-low income levels. The granting of the density bonus is further supported by the fact that the project is exceeding the minimum thresholds prescribed by the Zoning Code with regard to onsite parking, side yard setbacks, open space (both private and common), and bicycle parking. Information to support the density bonus is provided in the Density Bonus Report, which is included with the Project's staff report.

#### EXHIBIT B

## **CONDITIONS**

#### **GENERAL**

# 1. Approved Plans

The project approval is based upon the plans received on October 16, 2018, except as modified by these conditions.

# 2. Affordable Housing

The applicant shall offer the City eight (8) below market rate units as follows: a) one (1) three-bedroom unit at the moderate-income level; b) one (1) two-bedroom unit at the moderate-income level; and c) six (6) one-bedroom units at the low-income level.

# 3. Upper Story Lighting

Any exterior lighting above the ground floor on the sides and rear of the building and on the rooftop deck shall be shrouded and/or directed down to minimize glare.

#### 4. Encroachment Permit

An encroachment permit and/or an excavation permit shall be obtained prior to any work done within the public right-of-way and it shall be in accordance with plans to be approved by the City Engineer. Note: Any work within El Camino Real will require applicant to obtain an encroachment permit with Caltrans prior to commencement of work.

# 5. Public Utilities

The applicant shall contact electric, gas, communication and water utility companies regarding the installation of new utility services to the site.

#### 6. Americans with Disabilities Act

All improvements shall comply with Americans with Disabilities Act (ADA).

# 7. Stormwater Management Plan

The applicant shall submit a complete Stormwater Management Plan (SWMP) and a hydrology calculation showing that 100% of the site is being treated; is in compliance with the Municipal Regional Stormwater NPDES Permit (MRP). Applicant shall provide a hydrology and hydraulic study, and an infeasible/feasible comparison analysis to the City for review and approval for the purpose to verify that MRP requirements are met.

#### 8. Sewer Lateral

Any proposed sewer lateral connection shall be approved by the City Engineer.

#### 9. Transportation Permit

A Transportation Permit, per the requirements specified in California Vehicle Code Division 15, is required before any large equipment, materials or soil is transported or hauled to or from the construction site.

# 10. 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 SUBMITTAL OF BUILDING PERMIT

# 11. Green Building Standards

The applicant shall provide verification that the project will comply with the City's Green Building Standards (Section 12.26 of the Municipal Code) from a qualified green building professional.

# 12. Property Address

The applicant shall provide an address signage plan as required by the Building Official.

# 13. 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.

# 14. Air Quality Mitigation

The applicant shall implement and incorporate the air quality mitigations into the plans as required by the report prepared by Illingsworth & Rodin, Inc., dated March 6, 2018.

# 15. Noise Mitigation

The applicant shall implement and incorporate the noise mitigation measures into the plans as required by the report by Wilson Ihrig, dated March 6, 2018.

## 16. Rooftop Deck

Provide design details for the rooftop deck sufficient enough to verify that the space can operate in compliance with the performance standards prescribed by Municipal Code Section 14.50.160.

#### PRIOR TO FINAL MAP RECORDATION

#### 17. Covenants, Conditions and Restrictions

The applicant shall include the following provisions in the Covenants, Conditions and Restrictions (CC&Rs):

- a. Storage on private patios and decks shall be restricted; and rules for other objects stored on private patios and decks shall be established with the goal of minimizing visual impacts.
- b. Long-term maintenance and upkeep of the landscaping and street trees, as approved by the City, shall be a duty and responsibility of the property owners. Specifically, the landscape buffer, including both trees and landscaping, along the rear property line shall be permanently maintained as required by the CT District per Municipal Code Section 14.50.110(C).
- c. The rooftop deck shall be permanently maintained in accordance with the performance standards for Rooftop Uses in the CT District as currently prescribed by Municipal Code Section 14.50.160.
- d. Both parking spaces in a tandem space shall be owned by the same unit and cannot be owned or used by separate units.

# 18. Public Utility Dedication

The applicant shall dedicate public utility easements as required by the utility companies to serve the site.

# 19. Payment of Fees

The applicant shall pay all applicable fees, including but not limited to sanitary sewer impact fees, parkland dedication in lieu fees, traffic impact fees and map check fee plus deposit as required by the City of Los Altos Municipal Code.

#### PRIOR TO ISSUANCE OF BUILDING PERMIT

# 20. Final Map Recordation

The applicant shall record the final map. Plats and legal descriptions of the final map shall be submitted for review by the City Land Surveyor. Applicant shall provide a sufficient fee retainer to cover the cost of the map review by the City.

# 21. Sidewalk Lights

The applicant shall maintain the existing light fixture and/or install new light fixture(s) in the El Camino Real sidewalk as directed by the City Engineer.

#### 22. Performance Bond

The applicant shall submit a cost estimate for the improvements in the public right-of-way and shall submit a 100-percent performance bond and 50-percent labor and material bond (to be held 6 months until acceptance of improvements) for the public right-of-way work.

#### 23. Maintenance Bond

A one-year, ten-percent maintenance bond shall be submitted upon acceptance of improvements in the public right-of-way.

# 24. Storm Water Filtration Systems

The applicant shall insure the design of all storm water filtration systems and devices are without standing water to avoid mosquito/insect infestation.

### 25. Grading and Drainage Plan

The applicant shall submit detailed plans for on-site and off-site grading and drainage plans that include drain swales, drain inlets, rough pad elevations, building envelopes, and grading elevations for review and approval by the City Engineer.

## 26. Sewage Capacity Study

The applicant shall show sewer connection to the City sewer main and submit calculations showing that the City's existing 27-inch sewer main will not exceed two-thirds full due to the additional sewage capacity from proposed project. For any segment that is calculated to exceed two-thirds full for average daily flow or for any segment that the flow is surcharged in the main due to peak flow, the applicant shall upgrade the sewer line or pay a fair share contribution for the sewer upgrade to be approved by the City Engineer.

# 27. Construction Management Plan

The applicant shall submit a construction management plan for review and approval by the Community Development Director and the City Engineer. The construction management plan shall address any construction activities affecting the public right-of-way, including but not limited to excavation, traffic control, truck routing, pedestrian protection, material storage, earth retention and construction vehicle parking. The plan shall provide specific details with regard to how construction vehicle parking will be managed to minimize impacts on nearby single-family neighborhoods. A Transportation Permit, per the requirements in California Vehicle Code Division 15, is required before any large equipment, materials or soil is transported or hauled to or from the site.

#### 28. Sewer Lateral Abandonment

The applicant shall abandon additional sewer laterals and cap at the main if they are not being used. A property line sewer cleanout shall be installed within 5-feet of the property line within private property.

# 29. Solid Waste Ordinance Compliance

The applicant shall be in compliance with the City's adopted Solid Waste Collection, Remove, Disposal, Processing & Recycling Ordinance (LAMC Chapter 6.12) which includes a mandatory requirement that all commercial and multi-family dwellings provide for recycling and organics collection programs.

# 30. Solid Waste and Recyclables Disposal Plan

The applicant shall contact Mission Trail Waste Systems and submit a solid waste and recyclables disposal plan indicating the type, size and number of containers proposed, and the frequency of pick-up service subject to the approval of the Engineering Division. The applicant shall also submit evidence that Mission Trail Waste Systems has reviewed and approved the size and location of the proposed trash enclosure. The enclosure shall be designed to prevent rainwater from mixing with the enclosure's contents and shall be drained into the City's sanitary sewer system. The enclosure's pad shall be designed to not drain outward, and the grade surrounding the enclosure designed to not drain into the enclosure. In addition, applicant shall show on plans the proposed location of how the solid waste will be collected by the refusal company. Include the relevant garage clearance dimension and/or staging location with appropriate dimensioning on to plans.

#### 31. Tree Protection

The applicant shall implement and incorporate the tree protection measures into the plans and on-site as required by staff and in accordance with the report by Kielty Arborist Services dated April 30, 2018.

# 32. Affordable Housing Agreement

The applicant shall execute and record an Affordable Housing Agreement, in a form approved and signed by the Community Development Director and the City Attorney, that offers eight below market rate units, for a period of at least 55-years, as defined in Condition No. 2. All of the below market rate units shall be constructed concurrently with the market rate units, shall be dispersed throughout the project as shown on the approved plans, and shall not be significantly distinguishable design, construction or materials.

#### PRIOR TO FINAL OCCUPANCY

# 33. Green Building Verification

The applicant shall submit verification that the structure was built in compliance with the California Green Building Standards pursuant to Section 12.26 of the Municipal Code.

# 34. Signage and Lighting Installation

The applicant shall install all required signage and on-site lighting per the approved plan. Such signage shall include the disposition of guest parking, the turn-around/loading space in the front yard and accessible parking spaces.

# 35. Acoustical Report

The applicant shall submit a report from an acoustical engineer ensuring that the rooftop mechanical equipment meets the City's noise regulations.

# 36. Landscape Installation and Verification

Provide a landscape Certificate of Completion, signed by the project's landscape professional and property owner, verifying that the trees, landscaping and irrigation were installed per the approved landscape documentation package.

# 37. Condominium Map

The applicant shall record the condominium map as required by the City Engineer.

# 38. **Driveway Visibility**

The applicant shall work with the Engineering Division to indicate a sufficient no parking area along El Camino Real to the north of the driveway to provide adequate sight visibility.

# 39. Sidewalk in Public Right-of-Way

The applicant shall install new sidewalk, vertical curb and gutter, and driveway approaches from property line to property line along the frontage of El Camino Real as required by the City Engineer.

# 40. Public Infrastructure Repairs

The applicant shall repair any damaged right-of-way infrastructures and otherwise displaced curb, gutter and/or sidewalks and City's storm drain inlet shall be removed and replaced as directed by the City Engineer or his designee. The applicant is responsible to resurface (grind and overlay) half of the street along the frontage of El Camino Real if determined to be damaged during construction, as directed by the City Engineer or his designee. Note: Any work within the El Camino Real will require applicant to obtain encroachment permit with Caltrans prior to commencement of work.

# 41. SWMP Certification

The applicant shall have a final inspection and certification done and submitted by the Engineer who designed the SWMP to ensure that the treatments were installed per design. The applicant shall submit a maintenance agreement to City for review and approval for the stormwater treatment methods installed in accordance with the SWMP. Once approved, City shall record the agreement.



October 17, 2018

City Council Attn: Jean Mordo, Mayor Los Altos City Hall 1 North San Antonio Road Los Altos, CA 94022

#### Altos One Planning Commission Revisions and Response

#### **BMR** Discussions

#### Planning Comments

• There were numerous comments regarding the nature of the BMR units within the project and the large Density Bonus request. In the end it was noted that the Density Bonus was commensurate with the additional features that were provided with the building and on the site. Those features included; increased setbacks at 4880 project, increased Open Space above the requirements, 2 parking spaces per unit, increased bicycle storage above standards, interior skylight feature, and overall building design.

#### Design Response

• The BMR mix has been adjusted. We have replaced Unit 502 with Unit 311, which are both 1 Bedroom / 1 Bathroom units. Unit 311 is +/- 120 square feet bigger than Unit 502.

#### Window trims

#### **Planning Comments**

- The intermittent window trim elements seemed random and they would prefer all the windows were treated in the same manner
- The stucco over foam trim was not desirable

#### Design Response

- All window trims were removed at stucco wall conditions
- All windows in stucco wall planes were recessed by 2" providing a shadow line

# Form board concrete walls and planters

#### Planning Comment

- There was concern that the craftsmanship on the form board concrete would leave the walls looking less desirable than anticipated.
- There was a concern that the grey concrete would not work well with the other colors

#### Design Response

• The walls and planters were revised to be clad with Equitone in a mix of slight color variations in a more tan / brown color family to provide a similar look to the concrete wall with a more consistent appearance. A sample of this material will be added to the Color and Materials board.

#### Wall finish materials

#### Planning Comment

 There was a comment that there was still too much stucco on the building and perhaps more material variation was needed. A natural stone or "some other tile" materials was suggested.

#### Design Response

- We have included an exterior cladding material (Equitone) to accent some of the feature elements
  of the building. We felt that this material accomplished the goal of "less stucco" without adding a
  material that deviated too far from the elevation style.
- In addition we have previously added expansion joints to the stucco areas which serve as an accent element and break up the stucco walls. The stucco will be a high quality sand finish per the submitted sample.

#### **Entry Element**

#### Planning Comment

- A concern was raised about the large storefront area looking like "cheap" aluminum storefront Design Response
  - This will be a nice entry detail with a high quality storefront material. A sample of the window materials is provided.
  - In addition we added an entry feature that broke up the larger expanse of storefront and created another level of detail that further highlighted the building entry. This feature is a built out form clad in the Equitone material to tie it into the other feature elements. Revised elevations as well as a perspective of the Entry have been provided.

#### Feature "eyebrow" Elements

#### Planning Comment

• There was a comment on the graceful proportions of the building features, but it was noted that the upper most element felt a little heavy and less graceful.

#### Design Response

- The elements in question are the areas where we have placed the new Equitone material to highlight them further
- We have thinned down that upper element and added transom windows in the space that was created.

#### **Project Vision**

The vision of Altos One is to offer a turn-key "city-living lifestyle" in the suburban market. It is a 50-unit residential condominium development with integrated services and community living spaces that embody the type of transit-supportive development envisioned through Grand Boulevard Initiative that City of Los Altos is part of. This site is a perfect example of a new infill development. Strategically located close to the largest mixed-use retail and consumer services center in the area, Altos One is expected to bring urban style and sophistication to the El Camino corridor of Los Altos.

The development has been designed to accommodate the unique mix of buyers in the area, including downsizing seniors, millennials, and multi-generational families. We chose specific features to meet the needs of each of these groups, such as offices in select units (for remote workers) and single-floor configurations (for seniors).

The suburban world is changing rapidly to bring elements of urban living. To accommodate this, we've chosen a location close to services, installed bike lockers, and built-in many features to make this a self-contained community.

Highlights of the project include:

- Open-living floor plans generally larger than other nearby developments
- All units single-story to maximize living space while appealing to all generations
- 550 square foot fitness facility with private spa-like patio
- 900 square foot Gathering Room with Kitchen and AV services overlooking El Camino
- 5500 square foot rooftop deck with grilling stations, bocce court, dining tables, and outdoor theater
- Storage units on each floor and bike lockers, in the underground parking designated for each unit
- Private community backyard nestled among towering redwoods
- "Solar-ready" wiring and mounts for solar panels on the rooftop deck
- Walking distance to Cal Train and directly on a major bus route

#### **Project Rationale and Benefits**

The Altos One development brings greatly needed market rate and affordable housing to Los Altos in the only area where high-density housing is possible, along El Camino Real. Located directly behind Altos One is an existing apartment complex, Los Altos Court. A recently approved 5-story, 21-unit residential condominium development is located next door at 4880 El Camino Real. These affirm the applicability of constructing housing in this location.

Within a quarter mile there are two supermarkets (Whole Foods and Safeway) along with more than 20 restaurants, dozens of consumer services or retail outlets, a hotel, and theater (coming soon). There is little need for commercial services in this area but a substantial demand for residential units.

Altos One benefits Los Altos in several ways:

- Providing approximately 10% of the housing units required in the current housing element
- Anticipated provision of over \$1,000,000 in property tax revenue (based on sales projections)
- Addition of 8 "below market rate" housing units
- Continuing legacy of luxury and sophistication in residential construction
- Reinforces the "urban living" trend along El Camino Real

#### **Building Design**

The building was designed with a high-end modern aesthetic and features a variety of exterior finishes including; a smooth stucco finish, siding accents and lower level railings, elegant glass railings at upper levels for contrast and views, architectural metal panels for feature elements, and board formed concrete at walls and planters. The building façade is highly articulated with multiple plane changes. These mostly vertical elements are broken up with a variety of horizontal balcony elements and canopies which accentuate the building forms. The building layout features a grand two story lobby entrance with a feature steel and glass stairway and glass railings at the second level.

The L-shaped lot and building footprint dictated the location of the elevator, stairway, and other building services at the elbow of the building mass. In order to make this space a bright and pleasant place we have designed a light-

Principal Architects:

Ralph Strauss C19511 • Jeff Potts C26734 • Keeth Lichtenberger C17338 • Lance Crannell C31189 • Jennifer Mastro C32960

well that runs from the roof to the first floor. This feature floods the intersection of the main hallways with light and provides a dramatic focal point at the exit of the elevator on each floor.

This building was designed to meet the needs of many different buyer profiles. As such, it includes a Fitness Room, a Gathering / Family Play Room, and a rear yard area to provide for safe outdoor play at the ground level for children. The varied setback at the rear of the building also provides for a nice stepping of the building mass that helps to break up the larger walls at the rear elevation. A more adult outdoor area is provided on the roof deck above the taller portion of the building.

#### **Vehicular Access**

The project proposes combining 2 existing driveways into a single vehicular access point near the center of the combined parcels. The driveway / ramp will access a two level sub-grade parking garage which was reconfigured to two levels so that mechanical parking lifts would not be required. The underground Parking Levels consists of 50,000 square feet and include 108 car parking spaces, 50 bicycle lockers, the trash enclosure, mechanical room, and vertical circulation. The parking spaces are provided in both Standard and Tandem configurations. The resident parking includes 44 tandem parking spaces, and 56 standard spaces including required ADA compatible spaces. There are also 8 guest parking spaces including required ADA spaces. The guest spaces are all located to the right side of the ramp while the resident spaces are all located to the left side of the ramp.

#### Pedestrian Access

The project would set its building farther back from the street than the existing building at 4846 El Camino Real. The existing building comes right to the back of the sidewalk. The increased setback would create a more comfortable environment for pedestrians. The two buildings at 4846 and 4856 El Camino Real have two driveways with a combined width of about 50 feet. The project would provide one driveway with a width of about 22 feet. Thus, the exposure of pedestrians to potential conflicts with vehicles would be significantly reduced. The project includes a front door on El Camino Real for convenient access to the sidewalk.

#### **Bicycle Access**

The project proposes to exceed the Santa Clara Valley Transportation Agency (VTA) bicycle parking guidelines. The guidelines specify that secure long-term bicycle parking should be provided at a ratio of one space per three units, which would require 17 bicycle parking spaces. The project proposes a secure bicycle storage room with 10 individual lockers as well as 16 bike racks. In addition there are 19 more individual bicycle lockers situated under the stairway within the sub-grade garage. This provides a total of 45 secure bicycle storage spaces. The VTA guidelines also specify that 4 short-term bicycle spaces should be provided. The project proposes four short-term spaces at a bicycle rack near the front door.

### **Building Storage**

The building is designed to accommodate the storage needs of the residents to the greatest extent possible. Each level of the building has a central storage area that contains individual locking storage spaces. The storage spaces are fully enclosed and have 3' access doors. In addition to these central storage spaces, storage areas were a primary focus of the unit designs especially for the larger units which may be occupied by families. Wherever possible large storage closets were included within the design of the units.

### **DENSITY BONUS**

Affordable Units: 8 units

- 2 moderate / 6 very low: (6 very low / 28 = 21.4 % = 75.25 % Density Bonus)
- 28 units x 75.25 % = 50 units
- Proposed Building Configuration:
  - o (9) 1 bedroom units 780 sf 900 sf
  - o (30) 2 bedroom units 1080 sf 1550 sf
  - o (11) 3 bedroom units 1570 sf 2300 sf
- Proposed BMR Units:
  - o (6) 1 bedroom /1 bathroom very low income
  - o (1) 2 bedroom /2 bathroom moderate income
  - o (1) 3 bedroom /2 bathroom moderate income

#### **DENSITY BONUS CONCESSIONS AND WAIVERS**

This project is providing 8 BMR units and is requesting a 75.25% Density Bonus. With 21.4% Very Low Units the project is entitled to three incentives or concession.

(4%) 824 SF

(4.6%) 942 SF

#### Incentives (15% very low = 3 incentives)

	Standard	Requested
1. Rear yard setback decrease by 20% (4th and 5th floors only)	100'	60'
2. Rear yard setback decrease by additional 20 % (4th and 5th floors only)	100'	60'
3. Height increase		
Front portion of building including increased setback area	45'	58'
Rear portion of building outside increased setback area	30'	35'
<u>Waivers</u>		
1. Flevator Tower Height Increase	12'	17'-10.75"

2. 118 SF Roof Structure increase\*
\*Includes elevators, stairs and trash enclosure

#### Parking Required per 65915(p) and LAMC 14.28.040 G2a

1 spaces per 1 Bed Unit: 9 Units x 1 spaces	9 Spaces
2 spaces per 2 Bed+ Unit: 41 Units x 2 spaces	82 Spaces
Visitor / ADA: included	0 Spaces
Total:	91 Spaces

Parking Provided

Resident	100 Spaces
Visitor / ADA:	8 Spaces
Total:	108 Spaces

#### **ELEVATOR TOWER INCREASE**

An elevator is required to access the Occupied Roof deck per the CBC ADA access requirements. Due to the required height of the elevator tower we have placed it towards the middle of the building. This location allows the taller tower to be hidden from street level views by the edges of the building. The requested elevator tower increase is based on the minimum height required to install the two elevators with the 8 levels of stops. There is 14'-7" of clearance required from the floor level of the highest stop to the underside of the hoist beam. The hoist beam for the elevator sits above that required clearance and below the roof of the elevator shaft. The roof structure itself is +/-18". Elevator sections and manufacturer's cut sheets have been provide in the package on sheets A14 and A15 for reference.

# MINUTES OF A REGULAR MEETING OF THE PLANNING COMMISSION OF THE CITY OF LOS ALTOS, HELD ON THURSDAY, SEPTEMBER 20, 2018 BEGINNING AT 7:00 P.M. AT LOS ALTOS CITY HALL, ONE NORTH SAN ANTONIO ROAD, LOS ALTOS, CALIFORNIA

# **ESTABLISH QUORUM**

PRESENT: Chair Bressack, Vice Chair Samek, Commissioners Bodner, Enander, Lee,

McTighe and Meadows

STAFF: Planning Services Manager Dahl and Senior Planner Golden

#### PUBLIC COMMENT ON ITEMS NOT ON THE AGENDA

None.

# ITEMS FOR CONSIDERATION/ACTION

#### **CONSENT CALENDAR**

#### 1. Planning Commission Minutes

Approve the minutes of the September 6, 2018 Regular Meeting.

<u>Action</u>: Upon motion by Commissioner Enander, seconded by Commissioner McTighe, the Commission unanimously approved the minutes from the September 6, 2018 Regular Meeting as amended.

The motion was approved (7-0) by the following vote:

AYES: Bodner, Bressack, Enander, Lee, McTighe, Meadows and Samek

NOES: None ABSENT: None

#### **PUBLIC HEARING**

# 2. <u>18-D-01, 18-UP-01 and 18-SD-01 – Mircea Voskerician – 4846 – 4856 El Camino Real</u>

Design Review, Use Permit, and Subdivision applications for a new five-story, multiple-family, condominium building with 50 units and two levels of underground parking. The application includes a density bonus and development incentives to allow for increased building height and a reduced rear yard setback for the upper stories. *Project Planner: Dahl* 

Planning Services Manager Dahl presented the staff report, recommending to the City Council approval of design review, use permit and subdivision applications 18-D-01, 18-UP-01 and 18-SD-01 per the recommended findings and conditions.

Project applicant Mircea Voskerician introduced the project and project architect Jeff Potts presented the project.

## Public Comment

Abby Ahrens, resident and owner of Enchante Hotel, spoke in support of the project.

# Commission Discussion

Commissioner Enander stated for the record that she does not have a conflict of interest since she has not prejudged the project and will judge fairly and impartially.

Commissioner Enander noted that the 3D renderings and additional modeling information was useful; the Construction Management Plan should manage construction parking to minimize impacts to the nearby neighborhood; and that the excavation work should not impact the redwood trees.

Commissioner Meadows expressed support for the project; noted that the information provided was very thorough; the design has improved with good use of materials; good outreach to the neighbors; a 75 percent density bonus is high, but it does provide additional BMRs as well as numerous other amenities exceeding code requirements.

Vice-Chair Samek expressed support for the project, but noted design concerns with the exterior materials; improve window treatments and window rhythm on El Camino Real frontage; improve front entry appearance; consider alternative to concrete wall along the front.

Commissioner Bodner noted that the overall design has improved, but still has some concerns with mix of exterior materials; supported design of the rooftop deck; expressed concerned about the 75 percent density bonus, noting that the project should increase size and/or number of BMR units.

Commissioner McTighe expressed support for the design; but noted that the project still had a lot of stucco; should look into use of natural stone; make the bike racks more accessible; provide an additional two-bedroom/three-bedroom to the BMR mix.

Commissioner Lee expressed support for the overall project; but noted that significant exceptions were being requested; exterior materials could be improved; good use of color and interior skylight a nice design element.

Chair Bressack expressed support for the overall project, noted the high quality and thorough nature of the project plans; that the size of the one-bedroom BMRs should be increased; a lot of stucco used; nice color palette; consider addition of some natural stone; good amount of parking with two spaces per unit.

Commissioner Enander noted that 4880 El Camino Real set a precedent with a five-story building; concerned about setting a further precedent, but understands the need for housing; should clarify the reasons why this project is allowed to go beyond 35 density bonus.

<u>Action</u>: Upon motion by Commissioner Meadows, seconded by Vice-Chair Samek, the Commission recommended approval of use permit and subdivision applications 18-UP-01 and 18-SD-01 to the City Council.

The motion was approved (6-1) by the following vote:

AYES: Bressack, Enander, Lee, McTighe, Meadows and Samek

NOES: Bodner (concerned about too great of a density bonus being given and the overall design)

ABSENT: None

Action: Upon motion by Commissioner Meadows, seconded by Commissioner McTighe, the Commission recommended approval of commercial design application 18-D-01 to the City Council, per the listed findings and conditions, with the following additional recommendations:

• The exterior design should be updated to address the Planning Commission's concerns and come back to the Commission for final approval prior to submittal of a building permit.

- Consider increasing the size and/or bedrooms in the BMR units and modifying income levels to best meet the City's needs of for-sale BMR units;
- Add a finding that notes additional project amenities, such as parking ratio, significant amount
  of open space, bike parking, and larger side yard setback, contributed to approval of the 75%
  density bonus; and
- The Construction Management Plan should outline how construction parking impacts on the nearby neighborhood will be minimized.

The motion was approved (6-1) by the following vote:

AYES: Bressack, Enander, Lee, McTighe, Meadows and Samek NOES: Bodner (concerned about the density and overall design)

ABSENT: None

The Commission took a five-minute break at 9:15 PM before the start of agenda item #3.

#### **STUDY SESSION**

# 3. <u>18-CA-03 – Paul Lovoi – Amendment to R3-4.5 Multiple-Family District</u>

A Planning Commission Study Session to consider potential amendments to the R3-4.5 Multiple-Family District (Zoning Code Chapter 14.16) to establish lot coverage, floor area ratio, setbacks, off-street parking, height of structures, daylight plane and other appropriate site standards. The R3-4.5 District includes all properties along Stevens Place and Marshall Court. *Project Planner: Golden* 

Senior Planner Golden presented the staff report, providing an overview and background to the R3-4.5 District.

Project applicant Paul Lovoi presented the request, noting that he wants clarity on the site standards for the district.

#### Public Comment

Resident Teri Wiss who lives adjacent to the R3-4.5 District, noted that any new standards should consider R1 adjacencies, should not increase the density, and that there should be adequate community outreach prior to adoption of new standards.

Resident Michelle Machado expressed concern about prescriptive easements and noted that nonconforming structures should be addressed.

Resident Conni Ahart noted that the units are old, small, and could be designed more efficiently by allowing changes to the footprint; need to establish standards to allow for improvements to the neighborhood.

Resident Nitin Panjwani expressed support for establishing site standards, supported ability to convert to a single-family use and would support allowing second stories.

Resident Ed North expressed concerns about potential privacy impacts if second story additions are allowed.

Resident Randall Mitchell expressed opposition to allowing second stories or increasing the density; concerned about the current lack of parking.

Resident Karen Chin expressed support for site standards that would allow for additions and remodels, but should be one-story only

Resident Eric Defriez noted that the density should not be increased, is concerned about two-stories being allowed, tenants and owners should be engaged, and that traffic is a concern along Homestead.

Resident Caroline Zimmer expressed concern about two-story additions and that there needs to be more outreach and education about the proposed zoning amendments.

# Commission Discussion

The Commission expressed general support for establishing development standards for the R3-4.5 District,

Commissioner Bressack noted that the new standards should avoid creating non-conforming structures.

Commissioner Enander noted that the process should include additional neighborhood outreach.

Commissioner Meadows noted that the standards should consider limiting the district to one-story.

Commissioner McTighe noted that the density should not be increased.

The Commission was in general agreement with regards to the questions posed by staff as follows:

- Examine the topographical differences between the neighborhoods;
- Explore single story restrictions because of the flag lots;
- Maintain the density of the neighborhood;
- Explore second story privacy impacts; and
- The proposed development standards should create the least amount of non-conforming situations.

#### **DISCUSSION**

### 4. <u>Story-Poles</u>

Discuss the City's Story-Pole policy.

Commissioner Enander noted that modified story poles for 4856 El Camino Real are still good.

Commissioner McTighe noted that story poles on sites with tenants are a safety risk.

Chair Bressack noted that there are issues with safety, the use of the site, and the cost of erecting the story poles.

Commissioner Bodner noted that story poles should be installed for only 60 days, regardless of the review time of the project, to minimize long term visual impacts.

The Commission noted that the intent of the discussion was to prepare for its joint meeting with the City Council and further discuss the topic with them.

#### **COMMISSIONERS' REPORTS AND COMMENTS**

Commissioner Meadows reported on the September 11, 2018 City Council meeting.

# POTENTIAL FUTURE AGENDA ITEMS

None.

# **ADJOURNMENT**

Chair Bressack adjourned the meeting at 10:36 P.M.

Zachary Dahl, AICP

Planning Services Manager



# PLANNING COMMISSION AGENDA REPORT

Meeting Date: September 20, 2018

**Subject**: Proposed Five-Story, 50-Unit Multiple-Family Building at 4856 El Camino Real

**Prepared by:** Zachary Dahl, Planning Services Manager

**Initiated by**: Applicant and Owner – Mircea Voskerician, LuxOne LLC

#### **Attachments:**

A. Draft Resolution

B. Applicant Materials

- Cover Letter
- Density Bonus Report
- Climate Action Plan Checklist
- Story Pole Certification and Approved Story Pole Plan
- C. Planning Commission Study Session Minutes, April 19, 2018
- D. Complete Streets Commission Meeting Minutes, June 27, 2018
- E. Traffic Report
- F. Air Quality and Greenhouse Gas Emissions Assessment
- G. Noise Study
- H. Arborist Report
- I. Public Correspondence
- J. Project Plans

#### Recommendation:

Recommend to the City Council approval of design review, use permit and subdivision applications 18-D-01, 18-UP-01 and 18-SD-01 per the findings and conditions contained in the resolution.

# **Environmental Review:**

The project is exempt from environmental review as in-fill development in accordance with Section 15332 of the California Environmental Quality Act of 1970 as amended.

### **Project Description:**

This is a development proposal that includes a Design Review, Use Permit and Subdivision application for a new five-story, multiple-family residential building with 50 condominium units, a rooftop common area and a two-level underground parking garage. The existing site includes a one-story commercial building currently occupied with office uses at 4846 El Camino Real and a two-story mixed-use building with personal service and office uses at 4856 El Camino Real. The proposal is offering eight affordable units – two moderate and six very-low – in exchange for a 75.25 percent density bonus and development incentives to allow for increased height and a reduced rear yard setback. The following tables summarizes the project's technical details:

GENERAL PLAN DESIGNATION: Thoroughfare Commercial

ZONING: CT (Commercial Thoroughfare)
PARCEL SIZE: 31,576 square feet (0.73 acres)

MATERIALS: Sand finish stucco siding with architectural metal panel and shiplap wood

accent siding, metal frame windows and doors, and glass balcony railings

	Existing	Proposed	Required/Allowed
SETBACKS:			
Front	6 to 14 feet	25 feet	25 feet
Rear	85 to 128 feet	40 feet/60 feet	40 feet/100 feet1
Right side	0 feet	7.5 feet (avg.)	7.5 feet (avg.)
Left side	0 feet	8.5 feet (avg.)	7.5 feet (avg.)
HEIGHT:			
Top of roof deck	14 to 30 feet	34.3 feet/58 feet	30 feet/45 feet <sup>2</sup>
Top of parapet wall	-	38 feet/63 feet	42 feet/57 feet
Stair towers	-	70 feet	57 feet
Elevator tower	-	75.9 feet	57 feet
PARKING:	42 spaces	108 spaces	91 spaces
DENSITY:	-	50 units (69 du/ac)	28 units (38 du/ac)
OPEN SPACE:			
Private	-	214 square feet/unit	50 square feet/unit
Public	-	8,855 square feet	2,400 square feet

The draft resolution contained in Attachment A includes the project's findings and conditions of approval. The project's Density Bonus Report and Climate Action Plan Checklist, along with a cover letter from the applicant, are included in Attachment B.

<sup>&</sup>lt;sup>1</sup> A setback of 40 feet is required for structures up to 30 feet in height and a setback of 100 feet is required for portions of the structure that are over 30 feet in height.

<sup>&</sup>lt;sup>2</sup> Height for structure within the 100-foot rear yard setback area and outside the 100-foot rear setback area.

# Background

### El Camino Real Moratorium

The project was originally scheduled for a Planning Commission study session on October 6, 2016. However, on October 4, 2016, the City Council held a special meeting to adopt an urgency ordinance to establish a temporary moratorium on development within the El Camino Real corridor. On November 15, 2016, the City Council extended the moratorium on development within the El Camino Real corridor for an additional four months in order to review the zoning regulations and design standards along the El Camino Real. On March 14, 2017, the City Council extended the moratorium an additional eight months in order to continue their review of changes and updates to the zoning regulations. Subsequently, the City adopted Zoning Code amendments related to the site standards for the CT District (Ordinance No. 2017-436) and affordable housing (Ordinance No. 2017-435). On November 15, 2017, the moratorium expired and the development proposal on the project site was allowed to proceed again.

# City Council-Planning Commission Joint Study Session

On January 16, 2018, the City Council held a joint study session with the Planning Commission to consider, among other things, a proposal from the Applicant to evaluate two alternative designs for the multiple-family project on the site. Both projects would be five-stories and similar in overall size, but one would require a density bonus over 35 percent and offer the City additional affordable units. The first proposal included 38 units with five affordable units, utilizing a 35-percent density bonus with mostly two- and three-bedroom units. The second proposal included 50 units with eight affordable units, utilizing a 75.25-percent density bonus with an increased number of one- and two-bedroom units and fewer three-bedroom units. Following a presentation by the Applicant and public comment, the Council and Commission discussed the proposals, with a majority of both bodies expressing support for the higher density proposal since it would provide the City with additional affordable units and reduce the average size of all of the units in the project; thus making them more affordable by design.

# Planning Commission Study Session

On April 19, 2018, the Planning Commission held a study session to review and provide feedback on the project's architectural and site design. Overall, the Commission, with only four members present, expressed general support for the project design, but noted that it should consider an improved mix of exterior materials, reduce the amount of stucco used, make sure landscaping along the side property lines was shade tolerant, and consider a different mix of exterior colors. A copy of the Planning Commission study session minutes is included as Attachment C.

#### Complete Streets Commission

On May 23, 2018, the Complete Streets Commission held a public meeting to consider the Project. As specified by the Zoning Code, the Commission is tasked with reviewing the bicycle, pedestrian, parking and traffic elements of a development application and providing an advisory recommendation to the Planning Commission and City Council. The Commission expressed general support for the Project, but expressed concern about the project increasing traffic on nearby side streets, potential parking spill-over on nearby residential streets and an increase in traffic on streets like Jordan Avenue, potentially creating an unsafe path for school kids. The Commission also expressed concern that

project's bike parking was underestimated, even though it significantly exceeded VTA's bicycle parking guidelines. Following the discussion, the Commission voted unanimously to recommend approval of the project to the Planning Commission and City Council. A copy of the Complete Streets Commission meeting minutes is included as Attachment D.

# Story Pole Exemption and Installation

On May 8, 2018, the City Council held a public meeting to consider a request from the Applicant for an exception from the City's Story Pole Policy due to safety concerns and impairment of the use of the existing structures on the site. The exemption request proposed a modified story pole plan that installed some, but not all, of the story poles required by the Policy. Following a discussion with the Applicant, the Council voted to approve the exemption request with the modified story pole plan.

On July 10, 2018, due to complications with the story pole installation, the Applicant returned to City Council and requested a full exemption from the City's Story Pole Policy. Following a discussion with the Applicant, the Council voted to deny the exemption request and directed staff to require the modified story pole plan be implemented before the project was scheduled for review by the Planning Commission.

On August 15, 2018, staff received a certification letter from the project's civil engineer verifying that the story poles had been installed per the approved plan. A copy of the certification letter and the approved story pole plan is included in Attachment B.

# Discussion/Analysis

#### General Plan

The General Plan contains goals and policies for the El Camino Real Corridor in the Land Use Element, Community Design & Historic Resources Element, Economic Development Element, and Housing Element which emphasize increasing commercial vitality, intensification of development, developing housing, including affordable housing, improving the streetscape of the El Camino Real corridor and ensuring compatibility with adjacent residential land uses and nearby single-family neighborhoods.

The Housing Element encourages maximum densities of residential development as well as facilitating affordable housing. The project is proposing a density of 69 units per acre, which would exceed the maximum density allowed for the El Camino Real corridor (38 dwellings per acre) and includes eight affordable dwelling units. The site is identified as an opportunity site in the Housing Element, with the potential to achieve up to 21 units. So, with proposed 50 units, eight of which are affordable, the project would significantly exceed the General Plans' housing projection for this site.

The Land Use Element encourages intensification along the El Camino Real corridor while also requiring that new development be compatible with nearby residential land uses. The site is adjacent to multiple-family land uses to the south and west, which include two-story apartment buildings and medium density condominiums (Los Altos Square). The proposed building has stepped massing that lowers as it gets closer to the adjacent multiple-family residential properties to the rear and a strong landscape buffer, including mature Redwood trees and an eight-foot tall masonry wall, along the rear property line.

The project is also consistent with the Community Design & Historic Resources and Economic Development elements since it will be improving the streetscape of the El Camino Real corridor, is designed to be compatible with the nearby residential neighborhood and will be improving economic vitality along the Corridor.

#### Zoning

The project is seeking incentives for increased building height and a reduced rear yard setback, and waivers for the height of the elevator tower and size of its the rooftop structures, which are further discussed below. Beyond these requests, the project meets or exceeds the minimum site standards for the CT District and other applicable Zoning Code requirements. The front setback is 25 feet, where 25 feet is required. The side setbacks range from approximately five to 19 feet, with an average setback of 8.5 feet on the left side and an average setback of 7.5 feet on the right side. An average of 7.5 feet is required from each side property line.

The CT District also requires multiple-family projects to provide permanently maintained open space, both private and common, as part of the development. For private open space, an average of 50 square feet per unit must be provided and a total of 2,400 square feet of common open space must be provided for a project with 50 units. As specified on Sheet A39 of the project plans, an average of 214 square of private open space per unit is being provided and a total of 8,855 square feet of common open space is being provided. Thus, the project is significantly exceeding the minimum standards required by Code.

As part of the common open space provided by the project, a 5,422 square-foot roof deck is proposed. This roof deck includes an outdoor kitchen, bocce court, fire pits, a water feature and a variety of seating areas. To ensure that rooftop uses such as this do not create negative impacts with regard to noise, light or other related activities, the CT District has established performance standards for rooftop uses. While it appears that the proposed rooftop deck will be able to comply with all applicable performance standards, appropriate conditions of approval have been included to ensure that the roof deck is in compliance both in terms of construction and long-term operation.

The project is seeking a total of three development incentives and two waivers in exchange for providing affordable housing. The first incentive is a height increase to allow a building height of 58 feet, where the Code allows a height of 45 feet, and a building height of 34.3 feet for the rear portion of the building where the Code allows a height of 30 feet. The other two incentives are for a reduced rear yard setback, two 20 percent reductions, to allow the fourth and fifth stories of the building to have a 60-foot setback where the Code requires a 100-foot setback. The two waivers that are being sought include allowing the elevator tower to be 17.9 feet above the roof deck where the Code allows a height of 12 feet and allowing the rooftop structures, which enclose the elevator tower, stairwells and trash chutes, to occupy 4.6-percent of the rooftop where the Code allows for a maximum of four-percent.

The project is also seeking a density bonus to exceed the CT District's residential density of 38 dwelling units per acre. The project site is 0.73 acres in size, which result in an allowable base density of 28 units. Based on the number of affordable units that are being provided, the Applicant has requested

a density bonus of 75.25 percent, which would allow for 22 additional units to be built on the site, resulting in a total of 50 units. The density bonus, development incentives and waivers are discussed in more detail in the Affordable Housing section below.

With regard to on-site parking, since the project is providing affordable housing, it is subject to the parking standards specified in Section 14.28.040(G). Based on these standards, the project is required to provide one onsite parking space per each one-bedroom unit and two on-site parking spaces for each two- or three-bedroom unit, which results in a minimum of 91 on-site parking spaces being required. These parking standards could be further reduced since the project is near a major transit stop, but the Applicant has not requested this reduction. The project is proposing a total of 108 parking spaces, which includes 40 tandem spaces, 60 standard spaces and three accessible spaces in two levels of underground parking. Of these spaces, eight are specified for guest parking on the first level of the underground garage. Overall, the proposed parking exceeds the minimum established by the Zoning Code. To ensure that the tandem spaces function properly, a condition has been added that requires both spaces to be owned by the same unit.

# Bicycle and Pedestrian Amenities

As recommended by the VTA guidelines, the project should provide at least 17 Class I bicycle parking spaces and four Class II spaces. As shown on the project plans (Sheets A0 and A1) a total of 45 secure bike storage spaces in the underground parking garage are proposed. This includes 29 individual lockers (Class I) and 16 protected bike racks (Class I equivalent). In addition, two bicycle racks with four spaces (Class II) are proposed at street level next to the building's front entrance on El Camino Real. Thus, the project is significantly exceeding the VTA Guidelines for bicycle parking spaces.

The project will be replacing the 7.5-foot wide public sidewalk along its full El Camino Real frontage (145 feet) and will be replacing the two existing driveway cuts with one new driveway cut to serve the underground garage parking garage. The building's front entrance is accessed via a wide walkway from the back of the public sidewalk. Common areas with pedestrian amenities for the building's residents are provided in the rear yard of the site and on a roof deck. Overall, the project's bicycle and pedestrian amenities appear to meet or exceed all applicable City policies and guidelines.

#### Design Revieu

In order to approve the project, the Commission must make positive design review findings as outlined in Section 14.78.050 of the Municipal Code. These design review findings are summarized as follows:

- The project meets the goals, policies and objectives of the General Plan and complies with any Zoning Code design criteria for the CT District;
- The project has architectural integrity and an appropriate relationship with other structures in the immediate area in terms of height, bulk and design;
- The horizontal and vertical building mass is articulated to relate to the human scale; it has variation and depth of building elevations to avoid large blank walls; and the residential elements that signal habitation such as entrances, stairs, porches, bays and balconies;
- The exterior materials that convey high quality, integrity, permanence and durability, and materials are used effectively to define building elements such as base, body, parapets, bays,

arcades and structural elements; and the materials, finishes, and colors have been used in a manner that serves to reduce the perceived appearance of height, bulk and mass, and are harmonious with other structures in the immediate area;

- The landscaping is generous and inviting, the landscape and hardscape complements the building and is well integrated with the building architecture and surrounding streetscape, and the landscape includes substantial street tree canopy;
- Any signage is appropriately designed to complement the building architecture; and
- Rooftop mechanical equipment and utility and trash areas are appropriately screened and integrated into the building's architectural design.

Overall, the project reflects a desired and appropriate development intensity for the CT District and the El Camino Real corridor. It achieves the maximum housing density permitted, which benefits the City's housing goals while also providing stepped massing from the rear property line and articulation along the front and sides to limit the perception of bulk and mass. It maintains and enhances the existing landscape buffer, which includes nine mature redwood trees, along the rear yard to minimize the visual impact on the adjacent multiple-family residential properties and establishes an appropriate level of compatibility with the nearby residential uses.

The exterior building materials appropriately define the building elements and convey the project's quality, integrity, durability and permanence. The project color palate has been updated to better define building elements and soften the overall appearance. The use of integrated metal panels, horizontal shiplap siding and control joints in the stucco conveys a sense of quality materials and supports the articulation to create smaller elements and reduced bulk and mass.

The landscape plan appears generous and inviting. Four new street trees will be planted in the El Camino Real right-of-way along the sidewalk and four specimen Coral Bark maples will be planted in the front yard space. The landscaping includes various levels with smaller plantings near the sidewalk with taller species and raised planters as it moves toward the face of the building. Board formed concrete seat walls, large form pavers and wood fences establish a base about the building.

The project does not propose any signage along the building frontage beyond an address number and directional signage as necessary by Code. The rooftop mechanical equipment is screened by architecturally integrated parapet walls, the ground level utilities are screened by the wood fencing along the sides and the trash area is located within the underground garage. Overall, as evidenced in this discussion and as further supported by the findings contained in Exhibit A of the resolution (Attachment A), the project has met the City's required design review findings.

#### CT District Design Controls

In addition to complying with the General Plan and standard design review findings, the project must address the CT District's design controls (Section 14.50.150), which speak to issues such as scale, building proportions, bulk, and screening rooftop mechanical equipment as follows:

• In terms of scale, because of the district's relationship to the larger region, a mixture of scales is appropriate with some elements scaled for appreciation from the street and moving vehicles and others for appreciation by pedestrians;

- The building element proportions, especially those at the ground level, should be kept close to a human scale by using recesses, courtyards, entries, or outdoor spaces;
- At the residential interface, building proportions should be designed to limit bulk and protect residential privacy, daylight and environmental quality; and
- Rooftop mechanical equipment should be screened from public view.

Overall, as discussed above, the project appears to have adequately addressed these design controls.

# Affordable Housing - Density Bonus and Development Incentives

The project exceeds the City's affordable housing regulations by providing eight affordable housing units, where three are required. Chapter 14.28 of the Municipal Code requires a minimum of 10 percent of the units as affordable at the moderate income level. The Code also stipulates that if there is more than one moderate income unit required, then the project must provide at least one of the units at the low or very-low income level. Since the base density for the project is 28 dwelling units, the project must provide 2.8 (rounded up to three) affordable units. By providing two moderate income units and one very-low income unit, the project is in compliance with the City's Affordable Housing Ordinance.

Housing Element program 4.3.2 requires that affordable housing units generally reflect the size and number of bedroom of the market rate units. In this case, the overall project is proposing nine one-bedroom units, 30 two-bedroom units and 11 three-bedroom units. Of this unit mix, one three-bedroom unit is designated affordable at the moderate income level, one two-bedroom unit is proposed at the moderate income level and six one-bedroom units are proposed at the very-low income level. While the mix of affordable units incorporates a larger number of one-bedroom units than the average of the market rate units, given the high percentage of overall affordable units proposed, it appears that this mix of affordable housing meets the intent of the program.

Under the State's density bonus regulations (Section 65915 of the California Government Code), the project qualifies for a density bonus if it provides at least five percent very-low income units. With six affordable units at the very-low income level and two affordable units at the moderate level, the project is providing 29 percent of its base density as affordable. Since proving only 11 percent very-low income units would quality the project for a 35 percent density bonus, the project is significantly exceeding the maximum as specified in State Law or the City's Affordable Housing Ordinance. However, both State Law and the City's Ordinance allow for the City to grant a density bonus over 35 percent if an appropriate number of additional affordable units are proposed. In this case, the Applicant is seeking a density bonus of 75.25 percent in exchange for providing 29 percent of his base density as affordable.

In addition to the density bonus, since the project is providing more than 11 percent of its units as affordable at the very-low income level, it qualifies for three development incentives per State Law and City Ordinance. To help guide incentives requested by developers and ensure that the incentives do not result in any adverse impacts, the City adopted a list of on-menu incentives or concessions. However, per State Law and City Ordinance, a project may still request any incentive or concession that they deem appropriate in exchange for the affordable units being provided (off-menu). In this case, as outlined above, the project is seeking a height incentive to allow the project to exceed the

maximum height limit of 45 feet by 13 feet (off-menu) and two 20 percent reductions in the rear yard setback for the upper floors (on-menu). The project is also seeking two waivers, which are considered more minor in nature, are needed to construct the proejct and do not require use of an incentive or concession. In this case, the project is seeking a waiver for the height of its elevator tower to go beyond the 12-foot limit since there are no elevators commercially available that can comply with the 12-foot height limit for a building of this height and to allow the size of the rooftop structures that enclose the elevator, stairways and trash chutes to exceed the maximum four percent threshold by 0.6 percent. Both of these waiver requests appear appropriate and reasonable for a project of this size and scope.

Under State Law and City Ordinance, the City must give deference to the Applicant on granting the requested development incentives unless it can make one or more of the following findings:

- The concession or incentive does not result in identifiable and actual cost reductions, consistent with the definition of "concession" or "incentive," to provide for affordable housing costs, as defined in Health & Safety Section 50052.5, or for rents for the targeted units to be set as specified in subsection (I).
- The concession or incentive would have a specific, adverse impact upon public health and safety or the physical environment or on any real property that is listed in the California Register of Historical Resources and for which there is no feasible method to satisfactorily mitigate or avoid the specific, adverse impact without rendering the development unaffordable to low-income and moderate-income households
- The concession or incentive would be contrary to state or federal law.

A Density Bonus Report that supports the density bonus and development incentive requests was prepared by the Applicant and is included in Attachment B.

For reference, the moderate income housing units would be limited in cost to be affordable to a household that makes no more than 120 percent of the County's median income and the very-low income housing units would be limited in cost to be affordable to a household that makes no more than 50 percent of the County's median income. The County's median family income for FY 2018 is \$125,200 per HCD calculations.

### Use Permit

Since multiple-family residential uses are identified as a conditional use in the CT District, a use permit is required as part of the project approval. The location of the use is desirable in that it improves an underdeveloped property along the City's El Camino Real corridor with an appropriate amount of high-quality market rate and below market rate housing. The project meets other objectives specified in the Zoning Code, which include maintaining an appropriate relationship with adjacent land uses, maintaining a safe traffic circulation pattern, and providing a high-quality design that enhances the City's distinctive character.

Due to the location of the site along the El Camino Real corridor and its relatively narrow frontage, it has limited commercial potential for the development of new retail space, but office uses may be feasible in this location. However, given the housing targets set in the City's Housing Element, the

City's Council's priority to see more affordable housing developed and the limited number of sites that can accommodate higher density housing projects, an all residential project at this location is desirable and essential for the City's comfort, convenience, prosperity and welfare, and in accordance with the overall objectives of the Zoning Code.

### Subdivision

The project includes a Vesting Tentative Map for Condominium purposes. The subdivision divides the building into 50 residential units and associated private and common areas. Under State law, a Vesting Tentative Map freezes the City's regulations that apply to the subdivision at the time of entitlement and provides certainty for the applicant.

The subdivision conforms to the permitted General Plan and Zoning Code densities as modified by State law. The subdivision is not injurious to public health and safety, and is suitable for the proposed type of development, and the subdivision provides proper access easements for ingress, egress, public utilities and public services.

#### Environmental Review

The project site, which is 0.73 acres in size, is considered a small in-fill site that is substantially surrounded by urban uses and does not contain significant natural habitat for endangered species. The development proposal is consistent with the General Plan and Zoning Ordinance, does not result in any significant effects related to traffic, noise, air or water quality, and is adequately served by all required utilities and public services. Therefore, in accordance with Section 15332 of the California Environmental Quality Act (CEQA) Guidelines the project is exempt from further environmental review.

With regard to traffic, Implementation Program C8 in the General Plan's Circulation Element requires a transportation impact analysis (TIA) for projects that result in 50 or more net new daily trips. As outlined in the project's traffic report prepared by Hexagon Transportation Consultants (Attachment E), the proposed project will generate 272 average daily trips as compared with the property's existing uses, which include a mix of office and personal service uses, that generate 228 average daily trips. Since the net increase is only 44 average daily trips, a full TIA is not required for this project.

With regard to air quality, since the project is located on a State Highway, the project could potentially expose long-term residents to air pollution and the project's construction has the potential to create short-term air pollution impacts. To address these potential impacts, an air quality and greenhouse gas emission assessment was prepared for the project by Illingworth & Rodkin (Attachment F). The assessment provides appropriate mitigation measures for controlling dust and exhaust during construction, air filtration for the dwellings, and construction equipment emission guidelines. The report's recommended mitigations are included as conditions of approval. With regard to greenhouse gas emissions, project does not exceed any of the significant thresholds as specified by the Bay Area Quality Management District's Clean Air Plan, so no mitigation measures are required. The applicant has also completed the City's Climate Action Plan checklist for new development (Attachment B) and will be complying with all applicable requirements to ensure that the project support's the City's greenhouse gas emission reduction targets.

With regard to noise, due to the site's proximity to a State Highway, the project is located in an area that may expose its residents to higher noise levels and the project's rooftop mechanical equipment may generate off-site noise levels that exceed thresholds established in the City's Noise Control Ordinance. To address these potential noise impacts, a noise study was prepared by Wilson Ihrig (Attachment G). To ensure that there are no significant noise impacts, the study recommends mitigation measures that specify certain types of exterior glazing, exterior wall construction and supplemental ventilation, and rooftop mechanical equipment noise controls so that the noise levels do not exceed City standards. Appropriate conditions of approval to ensure that the project is designed to comply with the noise study mitigation measures are included.

To evaluate potential tree impacts, an arborist report was prepared by Kielty Arborist Services (Attachment H). The arborist report evaluated the condition of 13 existing trees on the site and along its El Camino Real frontage and provided tree protection measures for the trees that are proposed to remain. All significant trees on the site, which include the nine mature redwood trees along the rear property line, are proposed to remain are identified as being in good health. Four smaller trees, three of which are along El Camino Real, are proposed for removal. The tree protection measures for the redwood trees along the rear have been appropriately incorporated in the conditions of approval.

Overall, as documented above, the project's technical studies support the finding that the project meets the criteria and conditions to qualify for as an in-fill development project that is exempt from further environmental review.

# Public Contact and Correspondence

For this meeting, a public hearing notice was published in the *Town Crier*, and mailed to the 154 property owners and business and residential tenants within 500 feet of the site. A public notice billboard with color renderings was installed along the project's El Camino Real frontage and story poles to represent the corners of the building and the elevator tower, as approved by the City Council (see discussion above) were installed. A story pole certification letter from the project engineer is included as Attachment B.

In addition to the required public notification, the applicant has conducted specific outreach to the owners of the directly adjacent properties, the tenants in the apartment buildings to the rear and the owners of the Los Altos Square Townhomes to the south and west of the project. These outreach efforts are summarized in the applicant's cover letter (Attachment B). To-date, staff has not received any correspondence from any nearby property owners or tenants regarding this prospect. However, staff has received a letter of support for the project from Carl Guardino with the Silicon Valley Leadership Group (Attachment I).

#### RESOLUTION NO. 2018-\_\_

A RESOLUTION OF THE CITY COUNCIL OF THE CITY OF LOS ALTOS MAKING FINDINGS, ADOPTING AN EXEMPTION UNDER THE CALIFORNIA ENVIRONMENTAL QUALITY ACT, AND APPROVING THE DESIGN REVIEW, USE PERMIT AND SUBDIVISION APPLICATIONS FOR A NEW 50-UNIT MULTI-FAMILY PROJECT AT 4856 EL CAMINO REAL

WHEREAS, the City of Los Altos received a development application from Mircea Voskerician, LuxOne LLC (Applicant), for a new 50-unit multiple-family residential building at 4846 and 4856 El Camino Real that includes Design Review 18-D-01, Use Permit 18-UP-01 and Subdivision 18-SD-01, referred to herein as the "Project"; and

WHEREAS, the Applicant is offering two moderate-income and six very-low-income affordable housing units as part of the Project; and

WHEREAS, the Applicant is seeking incentives under Government Code Section 65915(e) and Los Altos Municipal Code Section 14.28.040 to allow: a) a building with a primary height of 58 feet and a height of 35 feet for the rear portion, where the Code allows for 45 feet and 30 feet, respectively; and b) a rear yard setback of 60 feet for the five-story portion of the building, where the Code requires a rear yard setback of 100 feet; and

**WHEREAS,** the Applicant is seeking further waivers under Government Code Section 65915(e) to allow: a) the elevator tower to be 17.9 feet above the roof, where the Code allows such structures to be 12 feet above the roof; and b) enclosed roof top structures at 4.6 percent of the roof area, where the Code limits such structures to four percent of the roof area; and

**WHEREAS,** the Applicant is seeking a 75.25 percent density bonus, the incentives and waivers to allow development of the Project pursuant to Government Code 65915 and Los Altos Municipal Code Section 14.28.040; and

WHEREAS, said Project is exempt from environmental review as in-fill development in accordance with Section 15332 of the California Environmental Quality Act of 1970 as amended ("CEQA"); and

**WHEREAS**, said Project has been processed in accordance with the applicable provisions of the California Government Code and the Los Altos Municipal Code; and

**WHEREAS**, on May 23, 2018, the Complete Streets Commission held a public meeting on the Project and at the conclusion of the meeting voted to recommend approval to the Planning Commission and City Council; and

**WHEREAS,** on September 4, 2018 the City gave public notice of the Planning Commission's public hearing on the proposed Project by advertisement in a newspaper of general circulation and to all property owners within a 500-foot radius; and

WHEREAS, on September 20, 2018, the Planning Commission conducted a duly-noticed public hearing at which members of the public were afforded an opportunity to comment

upon the Project, and at the conclusion of the brecommended that the City Council the Project; and			
WHEREAS, on, 2018, the City Council held prescribed by law and considered public testimony a presented by staff related to the Project; and			
WHEREAS, all the requirements of the Public Resource and the regulations and policies of the City of Los Altos by the City in connection with the Project; and			
WHEREAS, the findings and conclusions made by the based upon the oral and written evidence presented as we record for the proposed Project, which is incorporated have not based solely on the information provided in this	ell as the entirety of the administrative terein by this reference. The findings		
WHEREAS, all other legal prerequisites to the adoption	n of this Resolution have occurred.		
<b>NOW THEREFORE, BE IT RESOLVED</b> , that the City Council of the City of Los Altos hereby approves the Project subject to the findings and the conditions of approval attached hereto as "Exhibit A" and "Exhibit B," and incorporated by this reference.			
I HEREBY CERTIFY that the foregoing is a true and correct copy of a Resolution passed and adopted by the City Council of the City of Los Altos at a meeting thereof on the day of, 2018 by the following vote:			
AYES: NOES: ABSENT: ABSTAIN:			
Attack	Jean Mordo, MAYOR		
Attest:  Jon Maginot, CMC, CITY CLERK			
TOTAL ENGLISHED A SINGLE A STATE OF A STATE			

### EXHIBIT A

#### **FINDINGS**

- ENVIRONMENTAL REVIEW FINDINGS. With regard to environmental review, the City Council finds, in accordance with Section 15332 of the California Environmental Quality Act Guidelines, that the following Categorical Exemption findings can be made:
  - a. The Project is consistent with the applicable General Plan designation and all applicable General Plan policies as well as with the applicable zoning designation (Commercial Thoroughfare) and regulations, including density bonus, incentives and waivers for the production of affordable housing;
  - b. The Project occurs within city limits on a site of no more than five acres that is substantially surrounded by urban uses and there is no record that the site has value as habitat for endangered, rare or threatened species;
  - c. Approval of the Project will not result in any significant effects relating to traffic, noise, air quality, or water quality and the completed technical studies and staff analysis contained in the agenda report support this conclusion; and
  - d. The Project has been reviewed and it is found that the site can be adequately served by all required utilities and public services.
- 2. DESIGN REVIEW FINDINGS. With regard to Design Review Application 18-D-01, the City Council finds, in accordance with Section 14.76.060 of the Los Altos Municipal Code, as follows:
  - a. The Project meets the goals, policies and objectives of the General Plan with its level of intensity and residential density within the El Camino Real corridor, and all Zoning Code site standards and design criteria applicable for a project in the CT District;
  - b. The Project has architectural integrity and has an appropriate relationship with other structures in the immediate area in terms of height, bulk and design because the project utilizes high quality materials that support its architectural style and is appropriately articulated and scaled to relate to the larger buildings on the El Camino Real corridor;
  - c. Building mass is articulated to relate to the human scale, both horizontally and vertically as evidenced in the design of the projecting overhangs, bay windows and balconies, the building elevations have variation and depth and avoid large blank wall surfaces, and the project has incorporated elements that signal habitation, such as identifiable entrances, overhangs, bay windows and balconies;
  - d. The Project's exterior materials and finishes convey high quality, integrity, permanence and durability, and materials are used effectively to define building elements. Materials, finishes, and colors have been used in a manner that serves to reduce the perceived appearance of height, bulk and mass, and are harmonious with other structures in the immediate area.

- e. Landscaping such as the large specimen coral bark maple trees, Brisbane box street trees, Saratoga laurel evergreen screening trees, hedges and groundcover is generous and inviting and landscape and hardscape features such as the custom paver walkway, board formed concrete planters and wood privacy fences are designed to complement the building and parking areas and to be integrated with the building architecture and the surrounding streetscape. Landscaping includes substantial street tree canopy including four new street trees in the public right-of-way, four new specimen coral bark maple trees in the front yard space and 11 new trees along the site perimeter;
- f. Signage, which is limited to the building address number and other required directional signage, will be designed to complement the building architecture in terms of style, materials, colors and proportions;
- g. Mechanical equipment is screened from public view by the building parapet and is designed to be consistent with the building architecture in form, material and detailing; and
- h. Service, trash and utility areas are screened from public view by their locations in the building garage and behind fencing in the side yards, and consistent with the building architecture in materials and detailing.
- 3. USE PERMIT FINDINGS. With regard to Use Permit 18-UP-01, the City Council finds, in accordance with Section 14.80.060 of the Municipal Code, as follows:
  - a. The proposed location of the multiple-family residential use is desirable and essential to the public comfort, convenience, prosperity, and welfare in that there are a limited number of sites that can accommodate new housing, the CT District has anticipated and planned for new housing along the El Camino Real corridor and the project provides housing at a variety of affordability levels;
  - b. That the proposed location of the multiple-family residential use is in accordance with the objectives of the Zoning Code since the project provides for community growth along sound lines, it is harmonious and convenient in relation to the surrounding land uses, it does not create any significant traffic impacts, it will help the City meet its affordable housing goals, it will protect and enhance property values and it will enhance the City's distinctive character with a high-quality building design in a commercial thoroughfare context;
  - c. That the proposed location of the multiple-family residential use, under the circumstances of the particular case and as conditioned, will not be detrimental to the health, safety, comfort, convenience, prosperity, or welfare of persons residing or working in the vicinity or injurious to property or improvements in the vicinity; and
  - d. That the proposed multiple-family residential use complies with the regulations prescribed for the CT District and the general provisions contained in Chapter 14.02.

- 4. SUBDIVISION FINDINGS. With regard to Subdivision 18-SD-01, the City Council finds, in accordance with Section 66474 of the Subdivision Map Act of the State of California, as follows:
  - a. The proposed condominium subdivision is consistent with the General Plan;
  - b. The Project site is physically suitable for this type and density of development in that the project meets all applicable Zoning requirements except where a density bonus and development incentives have been granted;
  - c. The design of the condominium subdivision and the proposed improvements are not likely to cause substantial environmental damage, or substantially injure fish or wildlife; and no evidence of such has been presented;
  - d. The design of the condominium subdivision is not likely to cause any serious public health problems because conditions have been added to address noise, air quality and life safety concerns; and
  - e. The design of the condominium subdivision will not conflict with any public access easements as none have been found or identified on this site.

# **EXHIBIT B**

#### **CONDITIONS**

#### **GENERAL**

# 1. Approved Plans

The project approval is based upon the plans received on July 20, 2018, except as modified by these conditions.

# 2. Affordable Housing

The applicant shall offer the City eight (8) below market rate units as follows: a) one (1) three-bedroom unit at the moderate-income level; b) one (1) two-bedroom unit at the moderate-income level; and c) six (6) one-bedroom units at the low-income level.

# 3. Upper Story Lighting

Any exterior lighting above the ground floor on the sides and rear of the building and on the rooftop deck shall be shrouded and/or directed down to minimize glare.

#### 4. Encroachment Permit

An encroachment permit and/or an excavation permit shall be obtained prior to any work done within the public right-of-way and it shall be in accordance with plans to be approved by the City Engineer. Note: Any work within El Camino Real will require applicant to obtain an encroachment permit with Caltrans prior to commencement of work.

### 5. Public Utilities

The applicant shall contact electric, gas, communication and water utility companies regarding the installation of new utility services to the site.

# 6. Americans with Disabilities Act

All improvements shall comply with Americans with Disabilities Act (ADA).

# 7. Stormwater Management Plan

The applicant shall submit a complete Stormwater Management Plan (SWMP) and a hydrology calculation showing that 100% of the site is being treated; is in compliance with the Municipal Regional Stormwater NPDES Permit (MRP). Applicant shall provide a hydrology and hydraulic study, and an infeasible/feasible comparison analysis to the City for review and approval for the purpose to verify that MRP requirements are met.

#### 8. Sewer Lateral

Any proposed sewer lateral connection shall be approved by the City Engineer.

# 9. Transportation Permit

All vehicles/loads exceeding a maximum gross weight of three tons are required to adhere to Los Altos Muni Code Chapter 8.16. Transportation Permits are approved by the City Engineer and shall follow State requirements as provided in California Vehicle Code Division 15.

## 10. 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 SUBMITTAL OF BUILDING PERMIT

## 11. Green Building Standards

The applicant shall provide verification that the project will comply with the City's Green Building Standards (Section 12.26 of the Municipal Code) from a qualified green building professional.

## 12. Property Address

The applicant shall provide an address signage plan as required by the Building Official.

## 13. 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.

## 14. Air Quality Mitigation

The applicant shall implement and incorporate the air quality mitigations into the plans as required by the report prepared by Illingsworth & Rodin, Inc., dated March 6, 2018.

## 15. Noise Mitigation

The applicant shall implement and incorporate the noise mitigation measures into the plans as required by the report by Wilson Ihrig, dated March 6, 2018.

## 16. Rooftop Deck

Provide design details for the rooftop deck sufficient enough to verify that the space can operate in compliance with the performance standards proscribed by Municipal Code Section 14.50.160.

## PRIOR TO FINAL MAP RECORDATION

## 17. Covenants, Conditions and Restrictions

The applicant shall include provisions in the Covenants, Conditions and Restrictions (CC&Rs) as follows:

- a. Storage on private patios and decks shall be restricted; and rules for other objects stored on private patios and decks shall be established with the goal of minimizing visual impacts.
- b. Long-term maintenance and upkeep of the landscaping and street trees, as approved by the City, shall be a duty and responsibility of the property owners. Specifically, the landscape buffer, including both trees and landscaping, along the rear property line shall be permanently maintained as required by Municipal Code Section 14.50.110(C).
- c. The rooftop deck shall be permanently maintained in accordance with the performance standards for Rooftop Uses in the CT District as currently proscribed by Municipal Code Section 14.50.160.

d. Both parking spaces in a tandem space shall be owned by the same unit and cannot be owned or sued by separate units.

## 18. Public Utility Dedication

The applicant shall dedicate public utility easements as required by the utility companies to serve the site.

## 19. Payment of Fees

The applicant shall pay all applicable fees, including but not limited to sanitary sewer impact fees, parkland dedication in lieu fees, traffic impact fees and map check fee plus deposit as required by the City of Los Altos Municipal Code.

#### PRIOR TO ISSUANCE OF BUILDING PERMIT

## 20. Final Map Recordation

The applicant shall record the final map. Plats and legal descriptions of the final map shall be submitted for review by the City Land Surveyor. Applicant shall provide a sufficient fee retainer to cover the cost of the map review by the City.

## 21. Sidewalk Lights

The applicant shall maintain the existing light fixture and/or install new light fixture(s) in the El Camino Real sidewalk as directed by the City Engineer.

## 22. Performance Bond

The applicant shall submit a cost estimate for the improvements in the public right-of-way and shall submit a 100-percent performance bond and 50-percent labor and material bond (to be held 6 months until acceptance of improvements) for the public right-of-way work.

## 23. Maintenance Bond

A one-year, ten-percent maintenance bond shall be submitted upon acceptance of improvements in the public right-of-way.

## 24. Storm Water Filtration Systems

The applicant shall insure the design of all storm water filtration systems and devices are without standing water to avoid mosquito/insect infestation.

## 25. Grading and Drainage Plan

The applicant shall submit detailed plans for on-site and off-site grading and drainage plans that include drain swales, drain inlets, rough pad elevations, building envelopes, and grading elevations for review and approval by the City Engineer.

## 26. Sewage Capacity Study

The applicant shall show sewer connection to the City sewer main and submit calculations showing that the City's existing 27-inch sewer main will not exceed two-thirds full due to the additional sewage capacity from proposed project. For any segment that is calculated to exceed two-thirds full for average daily flow or for any segment that the flow is surcharged in the main due to peak flow, the applicant shall upgrade the sewer line or pay a fair share contribution for the sewer upgrade to be approved by the City Engineer.

## 27. Construction Management Plan

The applicant shall submit a construction management plan for review and approval by the Community Development Director and the City Engineer. The construction management plan shall address any construction activities affecting the public right-of-way, including but not limited to excavation, traffic control, truck routing, pedestrian protection, material storage, earth retention and construction vehicle parking.

## 28. Sewer Lateral Abandonment

The applicant shall abandon additional sewer laterals and cap at the main if they are not being used. A property line sewer cleanout shall be installed within 5-feet of the property line within private property.

## 29. Solid Waste Ordinance Compliance

The applicant shall be in compliance with the City's adopted Solid Waste Collection, Remove, Disposal, Processing & Recycling Ordinance (LAMC Chapter 6.12) which includes a mandatory requirement that all commercial and multi-family dwellings provide for recycling and organics collection programs.

## 30. Solid Waste and Recyclables Disposal Plan

The applicant shall contact Mission Trail Waste Systems and submit a solid waste and recyclables disposal plan indicating the type, size and number of containers proposed, and the frequency of pick-up service subject to the approval of the Engineering Division. The applicant shall also submit evidence that Mission Trail Waste Systems has reviewed and approved the size and location of the proposed trash enclosure. The enclosure shall be designed to prevent rainwater from mixing with the enclosure's contents and shall be drained into the City's sanitary sewer system. The enclosure's pad shall be designed to not drain outward, and the grade surrounding the enclosure designed to not drain into the enclosure. In addition, applicant shall show on plans the proposed location of how the solid waste will be collected by the refusal company. Include the relevant garage clearance dimension and/or staging location with appropriate dimensioning on to plans.

## 31. Tree Protection

The applicant shall implement and incorporate the tree protection measures into the plans and on-site as required by staff and in accordance with the report by Kielty Arborist Services dated April 30, 2018.

## 31. Affordable Housing Agreement

The applicant shall execute and record an Affordable Housing Agreement, in a form approved and signed by the Community Development Director and the City Attorney, that offers eight below market rate units, for a period of at least 55-years, as defined in Condition No. 2. All of the below market rate units shall be constructed concurrently with the market rate units, shall be dispersed throughout the project as shown on the approved plans, and shall not be significantly distinguishable design, construction or materials.

## PRIOR TO FINAL OCCUPANCY

## 32. Green Building Verification

The applicant shall submit verification that the structure was built in compliance with the California Green Building Standards pursuant to Section 12.26 of the Municipal Code.

## 33. Signage and Lighting Installation

The applicant shall install all required signage and on-site lighting per the approved plan. Such signage shall include the disposition of guest parking, the turn-around/loading space in the front yard and accessible parking spaces.

## 34. Acoustical Report

The applicant shall submit a report from an acoustical engineer ensuring that the rooftop mechanical equipment meets the City's noise regulations.

## 35. Landscape Installation and Verification

Provide a landscape Certificate of Completion, signed by the project's landscape professional and property owner, verifying that the trees, landscaping and irrigation were installed per the approved landscape documentation package.

## 36. Condominium Map

The applicant shall record the condominium map as required by the City Engineer.

## 37. **Driveway Visibility**

The applicant shall work with the Engineering Division to indicate a sufficient no parking area along El Camino Real to the north of the driveway to provide adequate sight visibility.

## 38. Sidewalk in Public Right-of-Way

The applicant shall install new sidewalk, vertical curb and gutter, and driveway approaches from property line to property line along the frontage of El Camino Real as required by the City Engineer.

## 39. Public Infrastructure Repairs

The applicant shall repair any damaged right-of-way infrastructures and otherwise displaced curb, gutter and/or sidewalks and City's storm drain inlet shall be removed and replaced as directed by the City Engineer or his designee. The applicant is responsible to resurface (grind and overlay) half of the street along the frontage of El Camino Real if determined to be damaged during construction, as directed by the City Engineer or his designee. Note: Any work within the El Camino Real will require applicant to obtain encroachment permit with Caltrans prior to commencement of work.

## 40. **SWMP Certification**

The applicant shall have a final inspection and certification done and submitted by the Engineer who designed the SWMP to ensure that the treatments were installed per design. The applicant shall submit a maintenance agreement to City for review and approval for the stormwater treatment methods installed in accordance with the SWMP. Once approved, City shall record the agreement.

## **Applicant Materials**

- Cover Letter
- Density Bonus Report
- Climate Action Plan New Development Checklist
- Story Pole Certification and Approved Story Pole Plan

Planning Commission Attn: Pheobe Bressack Los Altos City Hall 1 North San Antonio Road Los Altos, CA 94022

The vision of Altos One is to offer a turn-key "city-living lifestyle" in the suburban market. It is a 50-unit residential condominium development with integrated services and community living spaces that embody the type of transit-supportive development envisioned through Grand Boulevard Initiative that City of Los Altos is part of. This site is a perfect example of a new infill development. Strategically located close to the largest mixed-use retail and consumer services center in the area, Altos One is expected to bring urban style and sophistication to the El Camino corridor of Los Altos.

The development has been designed to accommodate the unique mix of buyers in the area, including downsizing seniors, millennials, and multi-generational families. We chose specific features to meet the needs of each of these groups, such as offices in select units (for remote workers) and single-floor configurations (for seniors).

The suburban world is changing rapidly to bring elements of urban living. To accommodate this, we've chosen a location close to services, installed bike lockers, and built-in many features to make this a self-contained community.

Highlights of the project include:

- Open-living floor plans generally larger than other nearby developments
- All units single-story to maximize living space while appealing to all generations
- 550 square foot fitness facility with private spa-like patio
- 900 square foot Gathering Room with Kitchen and AV services overlooking El Camino
- 5500 square foot rooftop deck with grilling stations, bocce court, dining tables, and outdoor theater
- Storage units on each floor and bike lockers, in the underground parking designated for each unit
- Private community backyard nestled among towering redwoods
- "Solar-ready" wiring and mounts for solar panels on the rooftop deck
- Walking distance to Cal Train and directly on a major bus route

#### **Project Rationale and Benefits**

The Altos One development brings greatly needed market rate and affordable housing to Los Altos in the only area where high-density housing is possible, along El Camino Real. Located directly behind Altos One is an existing apartment complex, Los Altos Court. A recently approved 5-story, 21-unit residential condominium development is located next door at 4880 El Camino Real. These affirm the applicability of constructing housing in this location.

Within a quarter mile there are two supermarkets (Whole Foods and Safeway) along with more than 20 restaurants, dozens of consumer services or retail outlets, a hotel, and theater (coming soon). There is little need for commercial services in this area but a substantial demand for residential units.

Altos One benefits Los Altos in several ways:

- Providing approximately 10% of the housing units required in the current housing element
- Anticipated provision of over \$1,000,000 in property tax revenue (based on sales projections)
- Addition of 8 "below market rate" housing units
- Continuing legacy of luxury and sophistication in residential construction
- Reinforces the "urban living" trend along El Camino Real

#### **Building Design**

The building was designed with a high-end modern aesthetic and features a variety of exterior finishes including; a smooth stucco finish, siding accents and lower level railings, elegant glass railings at upper levels for contrast and views, architectural metal panels for feature elements, and board formed concrete at walls and planters. The building façade is highly articulated with multiple plane changes. These mostly vertical elements are broken up with a variety of horizontal balcony elements and canopies which accentuate the building forms. The building layout features a grand two story lobby entrance with a feature steel and glass stairway and glass railings at the second level.

The L-shaped lot and building footprint dictated the location of the elevator, stairway, and other building services at the elbow of the building mass. In order to make this space a bright and pleasant place we have designed a light-well that runs from the roof to the first floor. This feature floods the intersection of the main hallways with light and provides a dramatic focal point at the exit of the elevator on each floor.

This building was designed to meet the needs of many different buyer profiles. As such, it includes a Fitness Room, a Gathering / Family Play Room, and a rear yard area to provide for safe outdoor play at the ground level for children. The varied setback at the rear of the building also provides for a nice stepping of the building mass that helps to break up the larger walls at the rear elevation. A more adult outdoor area is provided on the roof deck above the taller portion of the building.

#### **Vehicular Access**

The project proposes combining 2 existing driveways into a single vehicular access point near the center of the combined parcels. The driveway / ramp will access a two level sub-grade parking garage which was reconfigured to two levels so that mechanical parking lifts would not be required. The underground Parking Levels consists of 50,000 square feet and include 108 car parking spaces, 50 bicycle lockers, the trash enclosure, mechanical room, and vertical circulation. The parking spaces are provided in both Standard and Tandem configurations. The resident parking includes 44 tandem parking spaces, and 56 standard spaces including required ADA compatible spaces. There are also 8 guest parking spaces including required ADA spaces. The guest spaces are all located to the right side of the ramp while the resident spaces are all located to the left side of the ramp.

## **Pedestrian Access**

The project would set its building farther back from the street than the existing building at 4846 El Camino Real. The existing building comes right to the back of the sidewalk. The increased setback would create a more comfortable environment for pedestrians. The two buildings at 4846 and 4856 El Camino Real have two driveways with a combined width of about 50 feet. The project would provide one driveway with a width of about 22 feet. Thus, the exposure of pedestrians to potential conflicts with vehicles would be significantly reduced. The project includes a front door on El Camino Real for convenient access to the sidewalk.

#### **Bicycle Access**

The project proposes to exceed the Santa Clara Valley Transportation Agency (VTA) bicycle parking guidelines. The guidelines specify that secure long-term bicycle parking should be provided at a ratio of one space per three units, which would require 17 bicycle parking spaces. The project proposes a secure bicycle storage room with 10 individual lockers as well as 16 bike racks. In addition there are 19 more individual bicycle lockers situated under the stairway within the sub-grade garage. This provides a total of 45 secure bicycle storage spaces. The VTA guidelines also specify that 4 short-term bicycle spaces should be provided. The project proposes four short-term spaces at a bicycle rack near the front door.

## **Building Storage**

The building is designed to accommodate the storage needs of the residents to the greatest extent possible. Each level of the building has a central storage area that contains individual locking storage spaces. The storage spaces are fully enclosed and have 3' access doors. In addition to these central storage spaces, storage areas were a primary focus of the unit designs especially for the larger units which may be occupied by families. Wherever possible large storage closets were included within the design of the units.

## **PROJECT DESCRIPTION**

This project is a multiple-family residential project at 4856 & 4846 El Camino Real. The project consists of a 50-unit, five-story building, with two levels of underground parking. The project replaces the existing Mohr Clock building and small Retail building totaling approximately 9,300 SF. The following table summarizes the project:

GENERAL PLAN DESIGNATION:Commercial ThoroughfareZONING:CT (Commercial Thoroughfare)PARCEL SIZE:0.72 acres (31,576 square feet)

MATERIALS: Painted plaster cement siding, siding accents and railings,

architectural metal panels, glass balconies railings, board

formed concrete walls.

	Existing	Proposed	Required/Allowed
SETBACKS:			
Front	23' & 6'	25'	25'
Rear Grading	N/A	20'	20'
Rear 30' Height Limit	85' - 128'	40'	40'
Rear 45' Height Limit	85' - 128'	60'	100'
Right side	0 feet	4' to 9'-6"	4' Min. / 7'-6" Ave.
Left side	0 feet	5'-6" to 14'-6"	4' Min. / 7'-6" Ave.
HEIGHT:			
40'-100' Zone	n/a	34'-3.75" / 57'-11.75"	30'
100' + Zone	n/a	57'-11.75"	45'
PARKING:	n/a	108 spaces	91 spaces (with density bonus)
DENSITY:	n/a	69 du / ac	38 du / ac

#### AFFORDABLE HOUSING

• Lot Size: 31,576 / 43560 = .72 ac

Allowable Density: .72 ac x 38 du/ac = 27.36 = 28 Units

Affordable Housing per LAMC
 27 du x 10% BMR = 2.71 = 3 BMR

#### **DENSITY BONUS**

- Affordable Units: 8 units
- 2 moderate / 6 very low: (6 very low / 28 = 21.4 % = 75.25 % Density Bonus)
- 28 units x 75.25 % = 50 units
- Proposed Building Configuration:
  - o (9) 1 bedroom units 780 sf 900 sf
  - o (30) 2 bedroom units 1080 sf 1550 sf
  - o (11) 3 bedroom units 1570 sf 2300 sf
- Proposed BMR Units:
  - o (6) 1 bedroom /1 bathroom very low income
  - o (1) 2 bedroom /2 bathroom moderate income
  - o (1) 3 bedroom /2 bathroom moderate income

#### **DENSITY BONUS CONCESSIONS AND WAIVERS**

This project is providing 8 BMR units and is requesting a 75.25% Density Bonus. With 21.4% Very Low Units the project is entitled to three incentives or concession.

## <u>Incentives (15% very low = 3 incentives)</u>

	Standard	Requested
1. Rear yard setback decrease by 20% (4th and 5th floors only)	100'	60'
2. Rear yard setback decrease by additional 20 % (4th and 5th floors only)	100'	60'
3. Height increase		
Front portion of building including increased setback area	45'	58'
Rear portion of building outside increased setback area	30'	35'

#### **Waivers**

1. Elevator Tower Height Increase	12'	17'-10.75"
2. 118 SF Roof Structure increase*	(4%) 824 SF	(4.6%) 942 SF

<sup>\*</sup>Includes elevators, stairs and trash enclosure

## Parking Required per 65915(p) and LAMC 14.28.040 G2a

1 spaces per 1 Bed Unit: 9 Units x 1 spaces	9 Spaces
2 spaces per 2 Bed+ Unit: 41 Units x 2 spaces	82 Spaces
Visitor / ADA: included	0 Spaces
Total:	91 Spaces

## Parking Provided

Resident	100 Spaces
Visitor / ADA:	8 Spaces
Total:	108 Spaces

#### **ELEVATOR TOWER INCREASE**

An elevator is required to access the Occupied Roof deck per the CBC ADA access requirements. Due to the required height of the elevator tower we have placed it towards the middle of the building. This location allows the taller tower to be hidden from street level views by the edges of the building. The requested elevator tower increase is based on the minimum height required to install the two elevators with the 8 levels of stops. There is 14'-7" of clearance required from the floor level of the highest stop to the underside of the hoist beam. The hoist beam for the elevator sits above that required clearance and below the roof of the elevator shaft. The roof structure itself is +/- 18". Elevator sections and manufacturer's cut sheets have been provide in the package on sheets A14 and A15 for reference.

July 17th 2018

Density Bonus Report 4856 & 4846 El Camino Real Los Altos, CA 94022

The proposed project is a 50 Unit Multi Family residential building on a .72 acre site at 4856 and 4846 El Camino Real. The site has a General Plan designation of Thoroughfare Commercial and a Zoning designation of CT. We are requesting Incentives per Government Code 65915 and LAMC 14.28.040. The project is providing 8 BMR Units including 2 Moderate Units and 6 Very Low Units which equal 21.43% and is therefore entitled to three Incentives per LAMC 14.28.040 Table DB 4 and a Parking reduction per LAMC 14.28.040 G2a. This site has not had any dwelling units on it in the last 5 years and does not have any recorded covenant, ordinance, or law applicable to the site that restricted rents to levels affordable to very low or lower income households.

The 50 Unit building was developed based upon the January 16<sup>th</sup> 2018 combined PTC and CC meeting. With the 50 units building 8 Below Market Rate units were proposed with a density bonus of 75% based on LAMC 14.28.040 Section E-7 which allows optional density bonuses at the discretion of the city. In addition as part of the increased density 9 one bedroom units were created to provide a wider range of unit types and sizes.

#### Summary Table

APN – 170-02-027 & 170-02-029 Site Size: 31,576 / 43560 = .72 acres General Plan: Thoroughfare Commercial Zoning: CT Commercial Thoroughfare

General Plan Density: No Density provided in Thoroughfare Commercial

Zoning Density: 38 Units / Acre = 28 Units

Density Bonus: 75.25%

Density Bonus Units: 22 Units Number of Units: 50 Units Actual Density = 69.4 du/ac Market Rate Units: 42 Units

(4) 1 Bedroom Units (28) 2 Bedroom Units (10) 3 bedroom Units

BMR Affordable Units: 8 Units

(6) 1 bedroom /1 bathroom very low income

(1) 2 bedroom /2 bathroom moderate income

(1) 3 bedroom /2 bathroom moderate income

## Incentives (15% very low = 3 incentives)

	Standard	Requested
1. Rear yard setback decrease by 20% (4th and 5th floors only)	100'	60'
2. Rear yard setback decrease by additional 20 % (4th and 5th floors only	') 100'	60'
3. Height increase		
Front portion of building including increased setback area	45'	58'
Rear portion of building outside increased setback area	30'	35'
<u>Waivers</u>		
1. Elevator Tower Height Increase	12'	17'-10.75"
2. 118 SF Roof Structure increase*	(4%) 824 SF	(4.6%) 942 SF

<sup>\*</sup>Includes elevators, stairs and trash enclosure

## Parking Required per 65915(p) and LAMC 14.28.040 G2a

1 spaces per 1 Bed Unit: 9 Units x 1 spaces	9 Spaces
2 spaces per 2 Bed+ Unit: 41 Units x 2 spaces	82 Spaces
Visitor / ADA: included	0 Spaces
Total:	91 Spaces

## Parking Provided

Resident	100 Spaces
Visitor / ADA:	8 Spaces
Total:	108 Spaces

## **Density Bonus Analysis**

The original proposal for this building was a 38-unit project with five (5) BMR units offered at very-low and (1) unit at moderate income level. Those 5 BMR units were contained in 6,422 net square feet. We asked for two incentives; a 20 ft setback encroachment and increased height. That project was designed but never submitted.

In the new proposal, the building is a 50-unit project with eight (8) BMR units offered, (6) units at very-low and (2) units at moderate income levels. The total size of the proposed 8 BMR units is now 7,575 net square feet. We asked for three incentives; a height increase/same as on the 38 units, the original 20% (20 ft) setback encroachment/same as on the 38 units and additional 20% (20 ft) setback encroachment as our 3<sup>rd</sup> incentive. The combination of the three incentives is what enables the density required to obtain the new building size and BMR units.

That third incentive (20% encroachment on rear set back- On Menu) is essential as it adds 3200 gross square feet (including circulation which is about 8% or 320 SF) to the building so we are left with about 3000 SF net building increase from 38 to 50 units. Of the 3000 SF, we're using 1153 square feet to satisfy the 8 BMR units. That leaves the developer with a gain of 1847 net square feet of market rate space in the larger building.

The gross cost of the proposed BMR units in the building is \$840 per square foot for the net living area. That adds up to approximately \$6.36M for the eight (8) BMR units. This includes all hard construction costs, soft costs, and land valuation when sold to the eventual builder.

All those values are in 2018 dollars and not forecast to 2020 which is when these units are expected to actually sell. In fact, given the rapid rise in construction costs, since this project will not start construction until 2019, it is reasonable to expect these costs to be at least 6-8% higher, potentially more.

The distribution of BMR units is proposed to be six (6) very-low income units as rentals and two (2) moderate income units for sale. The full value of the units, were they to be all sold, is shown in the table below. The two moderate units (one 3BR/2BA and one 2BR/2BA) will be sold which results in a cost recovery of \$738,000. This results in a loss of \$1.232M

The remaining six 1BR/1BA units will be rented for a period of 55 years. Using the table below, we show the baseline property value to be \$4,338M (for property tax purposes) for those units. A 1BR unit current rents for \$977 but since rents would not start until at least 2020, we're adjusting that to start at \$1016. We are not adding additional costs for financing.

Using those starting values, the rental units generate a net income of \$3.515M over the course of 55 years. This results in a net loss on the rental units of \$872,000. When combined with the loss from the sale of the moderate BMR units, the net project loss is approximately \$2.1M not including about \$600,000 in construction costs (garage configuration and additional elevator) plus \$110,000 in design changes (from 35 to 50 units) as detailed below bringing the total loss to about \$2.8M.

TOTAL BMR COST										
	Units	Net SF	\$/Unit	\$/SF	Total					
Gross Cost of BMR Units			\$723,284	\$838	\$6,351,591					
(Less) Low Income Unit Sales	6	5,224	(\$138,000)	(\$132)	(\$828,000)					
(Less) Mod Income Unit Sales	2	2,351	(\$369,000)	(\$785)	(\$738,000)					
Net Cost of BMR Units	8	7,575	\$598,199	\$632	\$4,785,591					

In order to achieve the proposed overall unit and BMR density, we had to substantially reduce unit sizes since on the 38 unit option we did not have 1/1's while with the 50 unit option we have 9 units as 1/1's. The additional unit count has pushed the design of the building to go from one story underground garage to two story underground garage, but eliminating mechanical parking. Construction delta between the two designs has an estimated increase to about \$450,000 considering going deeper and additional waterproofing based on the shallow water table. It has also forced the addition of a second elevator, at a cost of \$150,000. An estimated construction cost increase of about \$600,000 by building the 50 unit building. Approximately \$110,000 was spent for all design changes (architectural and civil) going from an already designed 35 unit building plus updating all reports (air quality, traffic, noise and vibration) to a 50 unit building.

The BMR allocation difference between the older 38-unit project and the current 50-unit project is a net gain of 1,153 NSF (net square feet).

That is calculated by using the following figures:

7,575 (current BMR square footage)

6,422 (old BMR square footage)

1,153 (overall increase in BMR square footage)

While the value of the new BMR square feet is substantial, the overall net square feet gained is 1,153 NSF which adds approximately \$1.6M in market-rate project gains (in 2018 dollars). If we were to forecast moderate market value growth in the next two years, that gain makes the creation of the additional BMR units well worth the effort. The distribution of units and their cost is broken down in the table below.

	Unit Sq Ft	Land Sq Ft	Config	
Unit 110	1,569	643.29	3BR / 2BA	Moderate
Unit 101	1,308	536.28	2BR / 2BA	Moderate
Unit 109	785	321.85	1BR / 1BA	Very Low
Unit 207	782	320.62	1BR / 1BA	Very Low
Unit 209	785	321.85	1BR / 1BA	Very Low
Unit 302	782	320.62	1BR / 1BA	Very Low
Unit 402	782	320.62	1BR / 1BA	Very Low
Unit 502	782	320.62	1BR / 1BA	Very Low
Gross SF	7,575	3,106		
V Low-Income SF	5,224			
Mod-Income SF	2,351			
Lot Size	31,576			
Gross Building SF	69,134			
Lot to Bldg Ratio	0.46	SF		
Gross Build \$/SF	\$478.13			
Gross Land \$/SF	\$361.62			
Total Cost	\$839.74			

Conclusion: The mix of units and overall square footage offered is a substantial portion of the overall building size. The cost of land and construction is high compared to the revenue gained by affordable housing compensation. The resulting profit, while moderate, is worth the effort.

## **NEW DEVELOPMENT CLIMATE ACTION PLAN CHECKLIST**

(Altos One - 4846&4856 El Camino Real, Los Altos, 94022)

## 1.1 Improve Non-Motorized Transportation

Project Compliance: N/A

Reasoning: Applies only to non-residential projects Altos One is residential.

## 1.2 Expand Transit and Commute Options

Project Compliance: N/A

Reasoning: Applies only to non-residential projects Altos One is residential.

## 1.3 Provide Alternative-Fuel Vehicle Infrastructure

**Project Compliance: YES** 

Description of compliance: EV Pre-wire is provided for at 25% of spaces

## 2.2 Increase Energy Efficiency

## Install higher efficiency appliances

**Project Compliance: YES** 

Description of compliance: The project will include high efficiency appliances

## Install high efficiency outdoor lights

**Project Compliance: YES** 

Description of compliance: The project will include high efficiency lighting.

## Obtain third party heating, ventilating and air conditioning (HVAC) commissioning

**Project Compliance: YES** 

Description of compliance: HVAC Commissioning is not required for residential projects.

## 3.1 Reduce and Divert Waste

## Develop and implement a Construction and Demolition (C&D) waste plan

**Project Compliance: YES** 

Description of compliance: A Construction and Demolition (C&D) waste plan will be developed and implemented prior to commencing demolition of existing structures.

## 3.2 Conserve Water

Reduce turf area and increase native plant landscaping

**Project Compliance: YES** 

Description of compliance: The project has been designed with no turf/lawn and has incorporated primarily all low and medium water-use Mediterranean climate adaptive plant species appropriate for Los Altos. The water conserving plant palette shall comply with the MWELO requirements (Model Water Efficient Landscape Ordinance).

## 3.3 Us Carbon Efficient Construction Equipment

Implement applicable Bay Area Air Quality Management District construction site and equipment best practices. Tables 8-1 and 8-2 in the District's Air Quality Guidelines (see separate handout)

**Project Compliance: YES** 

Description of compliance: Mitigation Measure 1 identified in the Altos One Air Quality report provided to city (page 7) implement applicable Bay Area Air Quality Management District (BAAQMD) construction site and equipment best practices. Mitigation Measure 3 (page 13) implements additional measures.

# **4.1** Sustain a Green Infrastructure System and Sequester Carbon Create or restore vegetative common space.

**Project Compliance: YES** 

Description of compliance: The landscape design includes common area social spaces with preservation existing mature redwood trees and new tree and shrub planting to assist with storing carbon. Common spaces are located at the ground level as well as incorporated into architecture as a roof deck landscaped amenity.

## Establish a carbon sequestration project or similar off-site strategy

Project Compliance: N/A

Description of compliance: The GHG emissions associated with the project are insignificant; therefore, an off-site mitigation strategy or carbon sequestration project is not required. In addition, the project is replacing an existing source of GHG emissions. As noted, the project landscaping would maintain mature vegetation and new tree and shrub planting to assist with carbon sequestration. The project emissions are less than significant because the project would have emissions below the levels that BAAQMD identified in their Air Quality Guidelines as requiring mitigation.

## Plant at least one well-placed shade tree per dwelling unit.

**Project Compliance: YES** 

Description of compliance: Although the size project site and the higher density housing architecture does not allow one shade tree per dwelling unit, the landscape design does provide shade trees wherever possible to help mitigate the urban heat island effect. The landscape design has incorporates 19 trees project-wide taking advantage of appropriate planting sites for root growth and canopy size.



Main Office: 2495 Industrial Pkwy. West Hayward, CA 94545 Ph: 510.887.4086 Fx: 510.887.3019

August 15, 2018

**Sacramento Region:**3017 Douglas Blvd., Ste. 300
Roseville, CA 95661
Ph: 916.966.1338
Ex: 916.797.7363

Building Department – City of Los Altos 1 North San Antonio Rd. Los Altos, Ca 94022 Phn-650-947-2752 Fax-650-947-2734

Subject: Altos One

4846 & 4856 El Camino Real

Los Altos, California APN: 17-02-029 Job No. 2160433 SU

To the Department:

Please consider this letter my certification that on August 14, 2018 we field verified the horizontal location and elevation of the erected story poles on the subject site and found the locations and heights of the Story Poles to agree with the story pole plan, A1, by SDG Architects, Inc.

Please call me with any questions.

Sincerely,



Alexander Abaya Land Surveyor

CC: Mircea

Email: mircea27v@gmail.com

## Altos One - Story Poles Partial Installation Exception Request

We are asking for an exception request due to:

Exception 1: Safety concerns

**Exception 2**: Impairment of the use of the existing structures and existing businesses

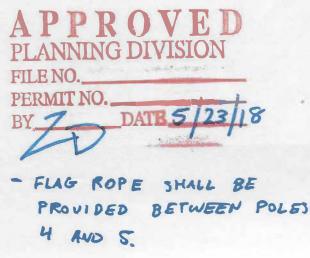
## 4846 ECR exception requested

1). Shifting/Olf Setting story pole location 9 and 10 by appx 10-12 ft of the two Staircase Tower Poles (2) due to Exception 1 & 2

Staircase Tower poles (4) would be placed in the ADA parking space and ADA ramp to the existing building, rendering the existing building non-compliant with ADA regulations. The parking space and ramp are located in front of the rear door of Unit A, thereby creating a safety concern for tenants entering and exiting the building.

Placement of these Story Poles takes over an additional 2 parking stalls affecting a total of 3 parking spaces (from a total of 9 stalls) on an already busy parking lot with two tenants. The poles, along with the orange webbing, will also block the fire escape and rear door of the tenant in Unit A, thereby making business operations infeasible. The story pole securing wires will span a minimum of 20 feet from the base of the pole at 120 degrees separation.

**Resolution:** We will install two Staircase Tower Poles No. 9 and 10 (appx 72 ft each) on top of the one story building/4846 ECR representing the back side of the staircase tower height. This location will be shifted by appx 10 ft from where the new staircase tower will be in the future but it is a good representation of the area/proximity and has the exact height.



## 4856 ECR exception requested

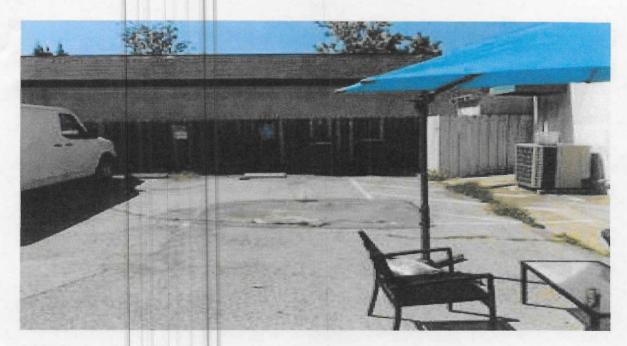
Building tenants include a medical treatment facility that has a high volume of disabled (blind or in wheelchair) patients and also a learning tutoring center with frequent traffic of students. See the traffic report below for details.

## 1. No installation of Elevator Tower Poles (4) due to Exception 1

Elevator Tower has 2 poles (76 ft in height) on a tile steep roof which represents a safety concern for installation.

**Resolution**: As requested by city council story pole consultant to provide an email to planning explaining the safety reasons why those 76 ft story poles cannot be installed on a 2<sup>nd</sup> story slope roof.

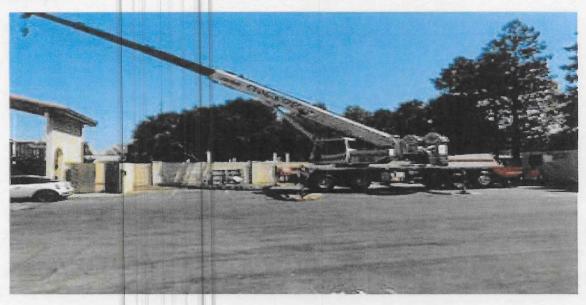




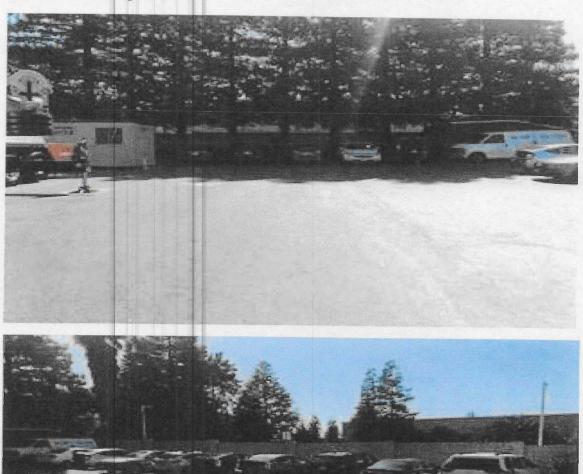
4846 Parking Area

2. **No String between Story Poles 5 and 4** due to the crane operation for the next 6 months supporting 4880 ECR development.

Any string at 58-60 ft will represent a safety issue that if the boom hits the string it can pull all poles down in the parking area since all poles are connected with strings.

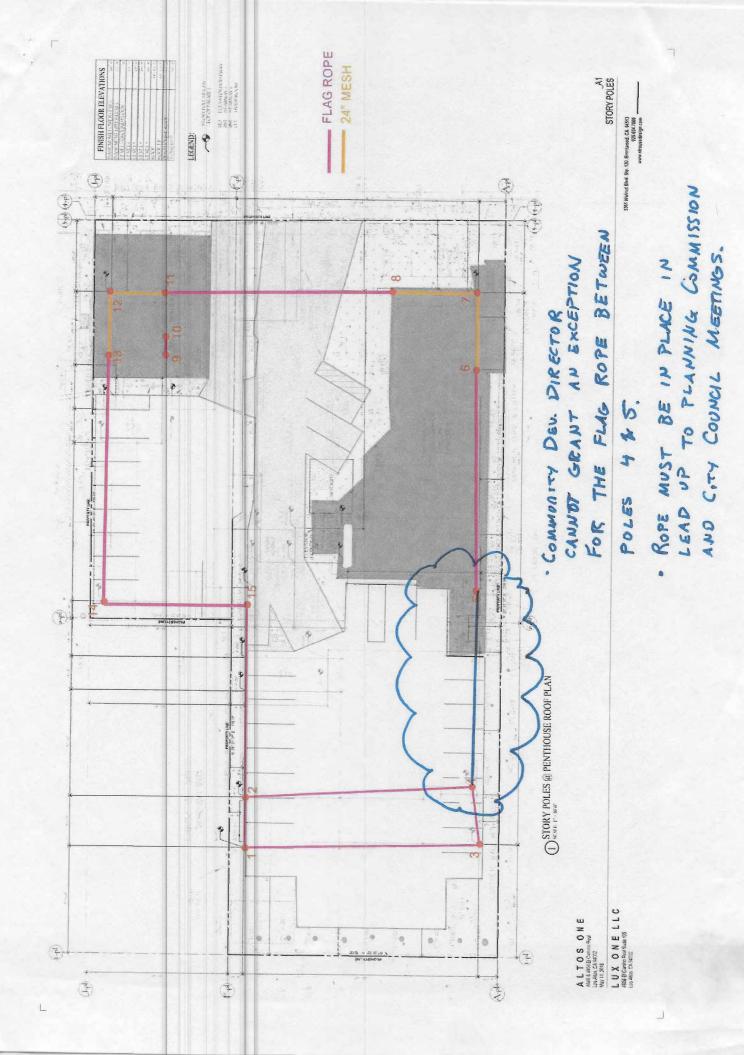


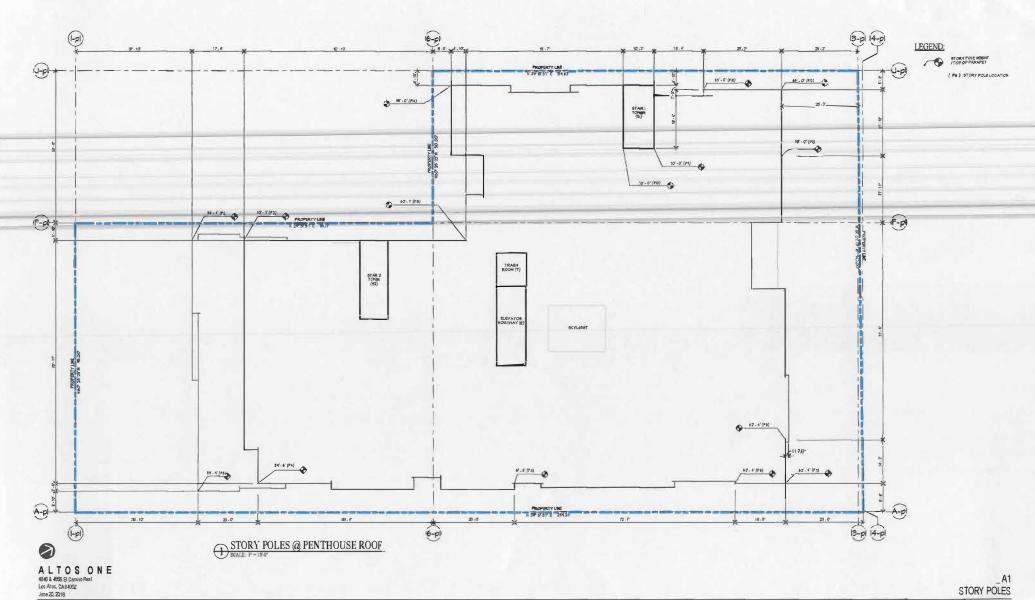
4856 ECR Parking area



4856 ECR Parking area

**NOTE:** City Council allowed developer at the May 8<sup>th</sup> meeting small adjustments on the location of story poles 1,2, 3, 4, 14 and 15 if they impede with parking operations and circulation through the parking area. We believe that those adjustments will be appx 2-3 ft off sets and will be determined by the story pole consultant during installation.





LUXONE LLC
4966 El Camino Real Sulle 100
Los Altos, CA94002

3351 Walnut Blvd. Ste. 120, Brentwood, CA 94513 975.534.7000 www.staucoderign.com



TOP OF BENATOR TOWN ROOF 57'-18/4' BH'-BBM' 22'- DYZ' OWER BASEMENT  $(\frac{1}{2})$ D П H  $(\vec{\underline{g}})$ WEST ELEVATION SCALE: ETT = 1-40  $\left(\frac{7}{2}\right)$ LOWER BAREHBYT

20'-6'
BLEVATOR PITT

28'-0' TOP OF BENATOR TOWN TOP OF STAR TONER ROOP --PETH FLOOR FOURTH ROOK THRE ROOR SECOND ROOR UPPER BASEMBIT PRET ROOR  $\left(\frac{1}{2}\right)$ 63' - 0' (P12, P13) (<u>n</u>)-田 田 田 (2) EAST ELEVATION SCALE SIZE-INF (9d) +- Z ⊕(Ld),† · Z9  $\left(\frac{1}{Q}\right)$ 

STORY POLEHESHT
/TOP OF PARAPET
( P. ) STORY POLELOC

LEGEND:

EAST AND WEST ELEVATIONS
381 Wahad Blvd. Oh. 120, Bernbroad, CA. 8613
825.544,700
825.544,700
871,71

A L T O S O N E

A L T O S O N E

Los Alex 4588 LOSE

Los Alex 2520

L U X O N E L C

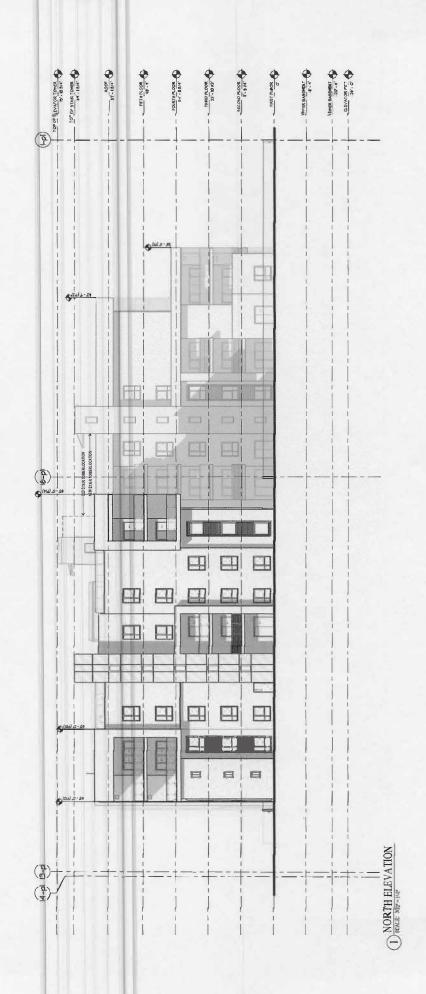
SECE Company States 100

L A Alex 450, 500, 500, 500

L A Alex 50, 500

L A Alex 50,

( PP ) STORT POLE LOCATION STORY POLEHBOHT LEGEND:



A L T O S O N E
484 & 489 S Canino Reni
Los Anos, CASOZO

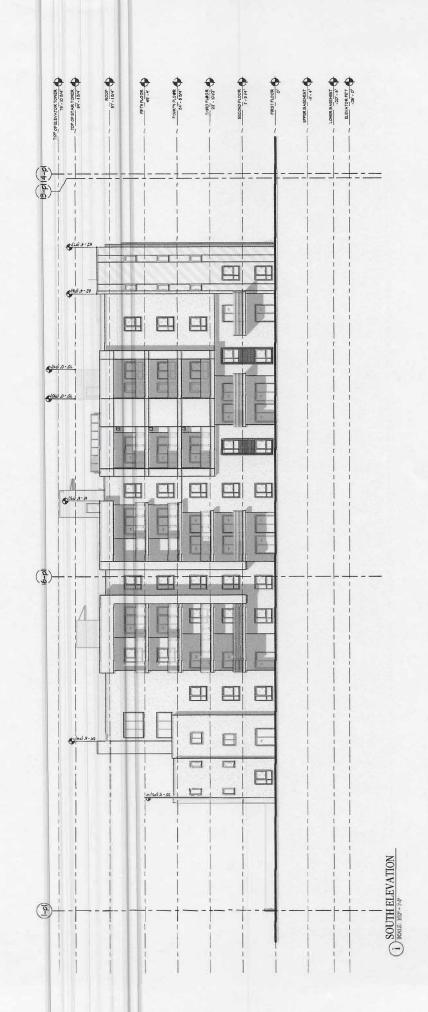
331 Wand Blud. Str. 72s, Bramwood, CA. 96519

S2534.7000

S20 Addition, No. 550 Addition, No. 550 Addition, No.

A3 NORTH ELEVATION

STORY POLEHEISHT LEGEND:



A L T O S O N E
496.4 6888 Camon Real
Lac Aloc, Chi-SCOTO
Anna 2, 2019
L U X O N E L L C
4878 C Camon Real
Lou X O N E L L C
4878 C Camon Real
Lou Anna, Chi-SCOTO
Lou Aloc, Chi-SCOTO

SOUTH ELEVATION

3361 Wahrst Bhd. Str. (20, Brentweed, CA 94513 925,534,7000 srww.cfrsuscdesign.com

Planning Commission Thursday, April 19, 2018 Page 1 of 2

# MINUTES OF A STUDY SESSION OF THE PLANNING COMMISSION OF THE CITY OF LOS ALTOS, HELD ON THURSDAY, APRIL 19, 2018 BEGINNING AT 6:15 P.M. AT LOS ALTOS CITY HALL, ONE NORTH SAN ANTONIO ROAD, LOS ALTOS, CALIFORNIA

## **ESTABLISH QUORUM**

PRESENT: Chair Bressack, Commissioners Enander, McTighe, and Meadows

ABSENT: Vice Chair Samek and Commissioner Bodner

STAFF: Community Development Director Biggs and Planning Services Manager Dahl

## ITEMS FOR CONSIDERATION/ACTION

## 1. <u>4846 – 4856 El Camino Real</u>

Design review for a new five-story multi-family residential project with 50 units and two levels of underground parking. *Project Planner: Dahl* 

Planning Services Manager Dahl introduced the project and gave a staff presentation.

Project architect Jeff Potts presented the project and provided an overview of the proposed design and exterior materials.

## Public Comment

Resident Arnie Cameron expressed support for the project design and additional affordable housing that would be provided.

Non-resident and local businessman Greg Bock expressed support of the project design and additional affordable housing that would be provided.

The Commission discussed the project and offered the following comments:

## • Commissioner McTighe:

- o Recommended linking the pictures on page A-04 of the project plans to the proposed building;
- o Show access to the units on page A2 of the project plans;
- o Provide additional information about the programming for the gathering/family playroom on page A3;
- O The number of storage rooms provided on each floor should match the number of units on that floor;
- o Consider reducing the amount of stucco used on the exterior and clearly identify all areas where stucco siding is proposed; and
- o Update the proposed landscaping between the project and 4880 El Camino Real to ensure that it can survive in a shaded environment.

## Commissioner Meadows:

- o Noted that increased shadowing and lower privacy thresholds are ok in urban environments such as the El Camino Real corridor;
- o Make sure plant selections along left side property line can survive in the shade;

- O Overall great design elements, but need a better understanding of the materials and how they will work together, because they are not adequately conveyed in the elevations;
- O Use a better or more appropriate mix of materials;
- o The roof deck and features are a plus and a well-designed space;
- o Make sure the tandem parking spaces are assigned to the same unit;
- o Appreciates the light well in center of building; and
- O Storage on each floor is a plus.

## • Commissioner Enander:

- The size of the units should be reduced so that it is more "affordable by design;"
- The building is a box and needs better representation;
- The windows should be recessed;
- Concern with the amount and color of the stucco on the lower right corner at the front elevation;
- Concern with landscaping and the lighting between the buildings and wants a landscape consultant to review the plan;
- The project should receive an external design review before coming back to the Planning Commission;
- The 3D renderings need to be from a street level/pedestrian eye level perspective; and
- Make this distinct a "Los Altos" building.

## • Chair Bressack:

- Large volume, but very well-articulated with a conscious effort to break-up the building in 3D so it won't read like a box;
- Landscaping along left side property line needs to be shade tolerant;
- Comfortable with as much plants as possible within the limits of the site;
- The light well in the building center is a plus and allows orientation within the building;
- Street level view is important to better understand the building;
- Review sheet A-04 and confirm finishes and trims on the building;
- Add expansion joints on walls with stucco to help articulate the building and preserve/maintain the stucco;
- Concern with how materials end/transition; the plans should provide additional details about how materials transition and how top edges are capped;
- Conceptually very nice in the break-up of materials and making of human scale;
- Consider alternative colors to create a bit more action in the building; and
- Design is rich modern and woody, but with a residential scale.

## ADJOURNMENT

Chair Bressack adjourned the meeting at 7:15 P.M.

Page 1 of 5

MINUTES OF THE COMPLETE STREETS COMMISSION (FORMERLY THE BICYCLE AND PEDESTRIAN ADVISORY COMMISSION) OF THE CITY OF LOS ALTOS, HELD ON WEDNESDAY, MAY 23, 2018 AT 7:00 P.M. AT THE LOS ALTOS CITY HALL-COMMUNITY CHAMBERS, ONE NORTH SAN ANTONIO ROAD, LOS ALTOS, CALIFORNIA

PRESENT: Suzanne Ambiel (Vice-Chair), Stacy Banerjee, Wes Brinsfield, Jerry Chester, Paul Van

Hoorickx, Randy Kriegh, Nadim Maluf (Chair), Susanna Chan (Staff Liaison), Aruna

Bodduna (Staff Liaison)

ABSENT: None

#### **PUBLIC COMMENTS**

None.

## ITEMS FOR CONSIDERATION/ACTION

## 1. Minutes

Upon a motion by Commissioner Hoorickx, seconded by Commissioner Maluf, the Commission approved the minutes of regular meeting on April 25, 2018, by the following vote: AYES: 6 NOES: 0. ABSTAIN: Brinsfield. ABSENT: None. Passed 6-0

Commissioner Banerjee amended minutes of Special Meeting on May 9, 2018 under Commissioner's report to say, "parent group is planning to try to create a route map for CMS/Cupertino Middle School (but not West Valley Elementary), in coordination with affected jurisdiction staff and CUSD". Upon a motion by Wes Brinsfield, seconded by Paul Van Hoorickx, the Commission approved the minutes of Special meeting on May 9, 2018, as amended, by the following vote: AYES: 6 NOES: 0. ABSTAIN: Maluf. ABSENT: None. Passed 6-0

## 2. Election

Staff Liaison Bodduna-Call for Nominations

- Chair
  - o Maluf-accepted
  - o Ambiel-accepted
  - o Maluf-elected and approved as Chair by a vote of 7-0
- Vice Chair
  - o Ambiel-accepted
  - o Ambiel-elected and approved as Vice Chair by vote of 7-0

Newly elected roles were effective immediately with Chair Maluf taking over proceedings

## 3. VTA Bicycle Pedestrian Advisory Committee Representative

Vice-Chair Ambiel nominated Commissioner Binsfield and he accepted the nomination. Commission recommended Commissioner Brinsfield to remain the Valley Transportation Authority Bicycle/Pedestrian Representative for the City of Los Altos. Passed 6-0.

## 4. New Multiple-Family Residential Building – 4856 El Camino Real

Zach Dahl, Planning Services Manager presented this item. The proposed project is located at 4846 & 4856 El Camino Real. This is a five-story, 50-unit residential condo project with two levels of underground parking. The Complete Streets Commission reviews aspects of the project related to pedestrian, bicycle, traffic circulation and parking and provides recommendation to the Planning Commission and the City Council.

## Questions/Comments:

Commission members asked questions below and Zach Dahl answered their questions:

- City requirements for pedestrian warning signs at the driveway entrance on the street no specific requirements, there is enough clearance/visibility on either side of the driveway; garage entrance is setback 25 feet.
- On-street level parking, if any? State dictates parking standards and the current project meets these requirements one loading space and 4.5 spaces along El Camino.
- General Plan and CEQA thresholds for traffic analysis; questions on trip generation methodology Per City's General Plan, if a proposed project generates 50 net new daily trips, it triggers a full traffic impact analysis (TIA); Valley Transportation Authority (VTA) guidelines state projects that generate more than 100 net new trips require full TIA. Project trip generation is based on the national standard practice, i.e., using Institute of Transportation Engineer's (ITE) manual.
- City standards for tandem parking and if any other projects in the City implement such parking; are tandem spots sold together? Regular parking spaces are 9'x18' and tandem spaces are double the length, i.e. 9'x36'. Other residential projects (single or multi-family) and some office projects have tandem parking. Tandem spots are generally sold together.
- Trash pick-up plan and coordination with the management company (Mission Trail)
- Height of the garage and if emergency vehicles can access the garage height of level one is 10', lower in level two.
- Bicycle clearance in the elevators, and how many bikes can be accommodated in the elevator at a time – there is enough clearance in the elevators to accommodate bikes, two bikes can fit in the elevate at a time.
- Is spill over parking anticipated with this project based on the trip generation estimates, this is not anticipated.
- Lighting near bike parking in the lower level and on-street bike racks there is lighting near the bike racks in front of the building and in garage.
- 20% ramp grade could pose unsafe situation for bike access, is there landing/flat area and what is alternate bike access elevator is anticipated bike access.
- What is the balcony size and will there be restriction on bike storage in the balconies? No covenant to restrict such usage; each unit also has storage unit that could be used for bike parking.
- Sidewalk width along El Camino, if the curb and gutter will be replaced and will the sidewalk furniture be replaced – sidewalk along El Camino is approximately 8 feet wide; curb and gutter will be replaced; where possible sidewalk furniture will be preserved, if impacted will be replaced.
- Will City of Mountain View review this project?
- Any estimate on school trips,
- Restriction of skateboarders using the parking entrance ramp (20% grade)

## Project applicant further clarified:

o Garage height: first level is 10' high, will confirm if 8.4' height on second level provides enough clearance for tow trucks

- o Restriction of skateboarders: requested CSC suggestions on this
- O Lighting: current plans are not at that details, however, project will comply with the code requirements
- o Garage floor will have textured surface
- o Elevators can fit 2 bikes; elevators designed to accommodate ambulance stretchers
- O Bikes to use elevators to access bike racks; bike parking in balconies HOA will control this not the developers; project exceeds VTA's bike parking requirements; some units have storage inside the unit for bike storage.
- o Potential buyers: age group 36-47 (60%), 60+ (20%), 25-35 (10%)
- o Fire department reviewed the plan
- o Trash pickup- received letter from Mission Trail agreeing to the trash pick-up area

Discussion: Commissioners generally supportive, noting that the project meets the General Plan guidelines and requirements. Commissioners said City needs to look into cumulative conditions traffic analysis. Were also concerned about increased traffic onto nearby side streets and potential parking spill over on to nearby residential streets, increase of school traffic onto streets like Jordan and potential impacts of spill over parking on this street creating unsafe path for school kids; Commissioners were also concerned that bike parking estimates could be under estimated although it meets the requirements. Suggested City need to be aggressive in planning and preparing for upcoming projects.

Upon motion by Commissioner Brinsfield, seconded by Commissioner Hoorikx, commission recommended approval of this project to Planning Commission.

Passed 7-0.

## 5. Stop Sign Analysis Study

Staff introduced traffic consultant Jaime Rodriguez from Traffic Patterns who conducted the stop sign analysis study. The locations for stop sign analysis in Downtown area were requests from Council Members and other locations were resident requests. Based on the study, all-way stop signs are warranted at Main/2<sup>nd</sup> and Main/3<sup>rd</sup> intersections. All the other studied intersections did not meet the warrant criteria.

## Questions/Comments:

Commission members asked questions below and Staff and Consultant answered their questions:

- Is stop sign a traffic calming measure No, it is a traffic control measure.
- What is the source of accident data Accident data was provided by Los Altos Police Department. This is more current than the SWIRTS data.
- Verify data presented for Miramonte/A Street intersection confirmed data in the report was incorrect and will modify to reflect accurate data. Revised report has been made available on the commission website after the meeting. This intersection still does not meet the warrant criteria.
- Does accident data include pedestrian and bicycle collision records Yes
- Would traffic detour onto other streets to avoid the new all-way stop signs Consultant conducted microsimulation analysis that shows enough capacity to accommodate queuing.

#### Public Comments:

Resident Jim Wing asked City to consider pedestrian scramble phase for Main/1<sup>st</sup> intersection in the simulation analysis. This location is not safe for peds and bikes. Supports mid-block crosswalk between State and 3<sup>rd</sup>. Doesn't encourage lot of additional signs.

Los Altos Village Association representative Scott Hunter supports the stops signs at Main/2<sup>nd</sup> and Main/3<sup>rd</sup>. Concerns about installing too many signs.

Discussion: Commissioner Hoorickx supports stop sign recommendation. Vice-chair Ambiel supports stop sign recommendation. Asked staff to consider Downtown streetscape. Commissioner Banerjee supports the stop sign recommendation, piano keys at Main/State intersection, however said that Downtown streetscape should be considered before installing new signs or pavement striping. Commissioner Chester supports stop sign recommendation, but not too much signage in Downtown area. Commissioner Kreigh supports study recommendations and supports crosswalk enhancements. Commissioner Brinsfield does not favor the stop sign in Downtown, concerned with noise & air pollution from stopped cars, does not favor too much signage or pavement striping. Chair Maluf agreed with Commissioner Brinsfield, does not favor stop signs in Downtown, may diver traffic onto other streets. Suggested revisiting City's Stop Sign Policy.

#### **INFORMATIONAL ITEMS**

## 6. Monthly Staff Report

Staff reported out on the following items:

- o Crosswalk & Intersection improvements Safe Routes to School projects is out for construction bid and bid opening of June 20, 2018
- O Staff is continuing to work on the Miramonte Avenue Path project, going through the Caltrans process
- O Staff is continuing to work on the El Monte Sidewalk Gap Closure project
- o Contractor on board to install speed feedback sign on Arboretum at Deodara
- o Contractor on board to install traffic signal battery back-up system
- o Staff reached out to LASD staff to regarding San Antonio/Portola intersection improvement project
- o Brown Act refresher training for May 29, 2018

## **COMMISSIONERS' REPORTS AND COMMENTS**

Commissioner Chester reported on Traffic Safe Communities Network (TSCN) meeting Commissioner Banerjee- reported on the May 21, Montclaire meeting where bike safety education program was discussed.

Commissioner Banerjee reported on the May 21 meeting at Montclaire Elementary School regarding bike safety education program options for Montclaire Elementary School; 5<sup>th</sup> grade DARE gradution at Montclaire; Safe Moves scheduled for next week; City of Los Altos/CUSD collaborative meeting on June 14.

Commissioner Hoorickx reported on the City Council meeting.

## POTENTIAL FUTURE AGENDA ITEMS

- Portola and Jordan Dr traffic impacts
- Parking outside Downtown core
- Cumulative traffic impacts discussion
- Downtown streetscape definition
- ITE traffic analysis and localizing for Los Altos
- City's Stop Sign Policy
- Examine new ordinances and policies for development proposals, use of LOS vs VMT, and their impacts to school routes

## **ADJOURNMENT**

Chair Maluf adjourned the meeting at 10:02 P.M.



# HEXAGON TRANSPORTATION CONSULTANTS, INC.

May 18, 2018

Mr. Zach Dahl City of Los Altos 1 North San Antonio Road Los Altos, CA 94022

Subject: Traffic Report for the Proposed Residential Project at 4856 & 4846

El Camino Real, Los Altos

Dear Mr. Dahl:

Hexagon Transportation Consultants, Inc. has completed this traffic report for the proposed residential project at 4856 & 4846 El Camino Real, Los Altos (see Figure 1). The project is proposing a total of 50 condominium units, including 9 one-bedroom units, 30 two-bedroom units, and 11 three-bedroom units. The project proposes 108 parking spaces.

The project would replace the existing buildings on two different sites: 4856 El Camino Real and 4846 El Camino Real. The existing two-story building at 4856 El Camino Real consists of Fit Theory gym (2,896 square feet) and Bay Area Hyperbaric (1,355 square feet) on the first floor and Think Tank Learning (1,400 square feet) and Pacific Rim Group Sourcing Corporation (1,667 square feet) on the second floor. The existing two unit building at 4846 El Camino Real consists of a startup, Hub Haus (1,000 square feet) in Unit B and Coppers dream pet rescue (1,000 square feet) in Unit A.

A trip generation analysis was conducted for the purpose of identifying the change in traffic due to the proposed development of the site. This study also includes an evaluation of site access and on-site circulation. Trip generation estimates were calculated for the weekday AM and PM peak hours of traffic. The AM peak hour of traffic is generally between 7:00 and 9:00 AM, and the PM peak hour is typically between 4:00 and 6:00 PM. It is during these periods that the most congested traffic conditions occur on an average day.

## **Project Trip Generation**

The magnitude of traffic generated by the project was estimated by multiplying the applicable trip generation rates by the size of the development. The Institute of Transportation Engineers (ITE) manual entitled *Trip Generation*, *10th Edition* was used for the analysis. The trip generation rates used for the proposed development are based on the rates published for "Multi-Family Housing -- Mid-Rise" (ITE Code 221). Based on these rates, the proposed project would generate 272 daily trips with 18 trips during the AM peak hour and 22 trips during the PM peak hour (see Table 1).

The magnitude of traffic that is being generated by the existing businesses on the sites was estimated based on trip generation rates published in the Institute of Transportation Engineers (ITE) manual entitled *Trip Generation*, *10th Edition* and information provided by existing tenants. As shown in Table 1, the existing uses on site are estimated to generate 228 daily trips with 13 trips during the AM peak hour and 75 trips during the PM peak hour.

After accounting for the trips generated by the existing businesses, the proposed residential project would generate 44 new daily trips with 5 new trips in the AM peak hour and 53 fewer trips in the PM peak hour (see Table 1). Since the proposed project would add fewer than 50 new daily trips, a



full transportation impact analysis would not be required per the Los Altos General Plan's Circulation Element.

Table 1
Trip Generation Estimates for 4856 & 4846 El Camino Real, Los Altos

					AM Peak Hour				PM Peak Hour			
Land Use	Size	Unit	Daily Rate	Daily Trips	Peak Rate	Trips In	Trips Out	Total Trips	Peak Rate	Trips In	Trips Out	Total Trips
Proposed Project												
Residential <sup>1</sup>	50.0	units	5.44	272	0.36	5	13	18	0.44	13	9	22
Exsiting Uses												
Gym <sup>2</sup>	2.896	ksf	24.171	70	1.31	2	2	4	3.45	6	4	10
Office <sup>3</sup>	1.667	ksf	16.19	27	1.92	2	1	3	2.45	1	3	4
Medical Office 4	1.355	ksf	38.16	52	3.69	4	1	5	3.28	1	3	4
School 5	1.400	ksf		56						28	28	56
R&D <sup>6</sup>	2.000	ksf	11.26	23	0.42	1	0	1	0.49	0	1	1
Total Existing	9.318	ksf	-	228	_	9	4	13		36	39	75
Net Project			_	44		-4	9	5		-23	-30	-53

#### Notes

All rates are from: Institute of Transportation Engineers, Trip Generation, 10th Edition

- 1. Land Use Code 221: Multifamily Housing (Mid-Rise) (average rates, expressed in trips per unit)
- 2. Land Use Code 492: Health/Fitness Club (average rates, expressed in trips per 1,000 s.f. gross floor area)
- 3. Land Use Code 712: Small Office Building (average rates, expressed in trips per 1,000 s.f. gross floor area)
- 4. Land Use Code 630: Clinic (average rates, expressed in trips per 1,000 s.f. gross floor area)
- 5. Daily trips were estimated based on information provided by Think Tank Learning Facility: maxium 20 students and 8 staff members on a regular weekday; hours of operation: Noon 8:00PM.
- 6. Land Use Code 760: Research and Development Center (average rates, expressed in trips per 1,000 s.f. gross floor area)

## **Parking**

The proposed project would provide 8 Below Market Rate (BMR) units, which is more than 10 percent of the total number of units. According to the Los Altos Municipal Code Ordinance 14.28.040 (C), the project would be eligible for a density bonus and would be qualified for or a parking requirement alteration. according to the Los Altos Municipal Code, Ordinance 14.28.040 (G), for any development eligible for a density bonus, upon the request of the developer, the city shall not impose a parking requirement, inclusive of handicapped and guest parking, of a development, that exceeds the following requirements:

- i. For zero to one bedroom, one onsite parking space.
- ii. For two to three bedrooms, two onsite parking spaces.
- iii. For four and more bedrooms, two and one-half parking spaces.

According to the city code, the project would require a total of 91 parking spaces (9 for one-bedroom units and 82 for two- and three-bedroom units). The site plan shows a two-level underground parking garage with 108 parking spaces. There would be 40 tandem spaces, 65



regular spaces, and 3 handicapped accessible spaces. Eight of the spaces (1 accessible) would be labeled for visitors. Thus, the parking would meet the City requirement.

## **Project Site Circulation and Access**

The project's site circulation and access were evaluated in accordance with generally accepted traffic engineering standards based on project plans dated May 15, 2018. The project would provide a single two-way driveway onto El Camino Real. Parking would be provided in a two-level basement garage as shown on Figures 2A and 2B. There would be a ramp off of El Camino Real leading to the parking garage and gated at the bottom of the ramp. A description of the various design elements of the site circulation and access is provided below.

**Driveway Design.** The project driveway on El Camino Real would be approximately 20 feet wide leading in and out of the basement parking garage. This width is adequate for a low-volume, two-way driveway. Because of the median on El Camino Real, only right turns in and out would be possible. The low volume of project traffic would result in only brief delays for exiting vehicles. Outbound vehicle queues would rarely exceed one or two vehicles. Sight distance at the project driveway would be adequate provided (1) the landscaping is kept at a low level within 10 feet of the curb face on El Camino Real and (2) sight distance is not blocked by parked vehicles. Parking should be prohibited on El Camino Real within 10 feet west of the driveway (i.e. looking left for an outbound driver from the project driveway).

Ramp Design. The proposed garage ramps were measured to be 21 feet wide, which meets the minimum width for a two-way drive aisle set forth by the City of Los Altos Zoning Code (14.74.200). The proposed garage ramp is shown to have a maximum slope of 20% with 10% transitions on each side. These dimensions are acceptable. Commonly cited parking publications recommend grades of up to 16% on ramps where no parking is permitted, but grades of up to 20% are cited as acceptable when ramps are covered (i.e. protected from weather) and not used for pedestrian walkways. It should be noted that the vast majority of ramp users will be residents, and thus, will quickly become accustomed to steeper grades.

Garage Design. On each level of the parking garage, there are two sections of parking: to the east of the ramp and to the west of the ramp. On both sides parking would be provided at 90 degrees to the main drive aisle. The drive aisles through the parking garage are shown to be 26 feet wide, which would provide sufficient room for vehicles to enter or back out of the 90-degree parking stalls, including the tandem stalls. Site access and circulation were evaluated using AutoTurn with vehicle turning movement templates for a typical AASHTO Passenger Car defined in AASHTO handbook 2011. Some examples of this type of vehicles are: 2018 Cadillac Escalade, 2018 GMC Yukon, 2018 Chevrolet Suburban, 2018 Ford Expedition, and 2018 Toyota Sequoia. The turning template check shows that large passenger vehicles would be able to access, circulate, and exit the garage without operational issues. The turning template check also indicates that vehicles would be able to access and exit from the parking spaces at the end of the drive aisle that are adjacent to the rear basement walls on each level without operational issues (see Figures 2A and 2B).

The plan shows guest parking spaces to the east of the garage ramp on the upper level of the garage. There should be signage directing guests to these parking spaces. The guest parking area has dead-end aisles, but they are very short, so motorists would be able to



see if there were any available spaces. Guests finding no available spaces would be able to exit the parking garage relatively easily. The resident parking area also has dead-end aisles, but residents would be familiar with the garage operations and would know where to find available spaces. There are some places in the upper level of the garage where visibility would be limited where the ramps and aisles turn corners. Vehicles parked on the parking spaces located opposite the entrance to the lower level ramp would need to be careful and pay attention to vehicles driving towards the ramps when backing out of those spaces. Hexagon recommends that convex mirrors be placed at all locations in the garage where visibility is limited.

Access to El Camino Real. Outbound at the project driveway on El Camino Real, the low volume of project traffic would result in brief delays for vehicles. Outbound vehicle queues would rarely exceed one or two vehicles. Sight distance at the project driveway would be adequate provided (1) the landscaping is low level within 10 feet of the curb face on El Camino Real (the height of the planned landscaping is not shown) and (2) it is not blocked by parked vehicles. Parking should be prohibited on El Camino Real within 10 feet west of the driveway (i.e. looking left for an outbound driver from the project driveway).

**Truck Access.** A 10' x 25' loading space is shown adjacent to the project driveway. This meets the City's minimum requirement for a loading area. Hexagon checked the turning radius with vehicle turning movement templates, and the results show that a small delivery truck (25 feet in length) would be able to back into and exit from the loading area. Figures 3 and 4 show potential turning paths created using AutoTurn with vehicle turning movement templates for a typical AASHTO vehicle.

Hexagon also checked other potential locations for the loading zone. Having a loading space perpendicular to El Camino Real or on the other side of the driveway would allow vehicles direct head-in access to the loading area from the right lane of El Camino Real. However, vehicles would have to back out onto El Camino Real or would block the pedestrian path. Therefore, either of these two choices are not better solutions compared to the current layout.

As an alternative option, a larger loading space could be provided either adjacent to the driveway or on the street along El Camino Real. According to the project applicant, dumpsters would be staged on-site and would pulled out by the garbage company.

**Bike Parking.** The Valley Transportation Authority (VTA) provides guidelines for bike parking in its publication *Bike Technical Guidelines*. Class I spaces are defined as spaces that protect the entire bike and its components from theft, such as in a secure designated room or a bike locker. Class II spaces provide an opportunity to secure at least one wheel and the frame using a lock, such as bike racks. For multi-family dwelling units, VTA recommends one Class I space per three dwelling units and one Class II space per 15 dwelling units. For the proposed project, this would equate to 17 Class I spaces and 4 Class II spaces. The project site plan shows a bicycle room under the garage ramp that would accommodate 10 bicycle lockers and 16 bike racks. The project also proposes to provide 19 bike lockers under the stairs near the tandem parking areas and 4 bike racks at street level near the front entrance.

**Pedestrian Access.** The project would provide a paved walkway between the existing sidewalk on El Camino Real and the building entrance.

Generally, the design of the project site circulation and access is consistent with urban design practices. The presence of the garage ramp, short onsite drive aisles, and "confined" feel of the parking garage would serve to keep vehicles operating at very low speeds. In addition, the low traffic volume onsite, one trip every two minutes, means that the frequency of vehicle conflicts would be relatively low.

#### Conclusions

This analysis produced the following conclusions:

- Relative to the existing use, the project would generate 44 new daily trips, including 5 new
  trips during the AM peak hour and 53 fewer trips during the PM peak hour. The amount of
  additional traffic generated would be low, and the impact on the greater transportation
  network would be negligible.
- The project meets the city requirements for the number of parking spaces.
- Commonly cited parking publications recommend grades of up to 16% on ramps where no parking is permitted, but grades of up to 20% are cited as acceptable under conditions that are present here. The grade of the garage access ramp is acceptable.
- The proposed plan shows good circulation through the two levels of the garage. The drive aisle is shown to be 26 feet wide and would provide sufficient room for vehicles to back out of the 90-degree parking stalls including the tandem stalls. The vehicle turning paths are constrained by the inner wall of the ramp at both ends under the current design. Hexagon recommends the design be revised to move back the wall to provide enough spaces for vehicles to make turns to and from the ramps.
- There are some places in the garage where visibility would be limited. . Hexagon recommends that convex mirrors be placed at all locations in the garage where visibility is limited.
- Outbound at the project driveway on El Camino Real, the low volume of traffic would result in brief delays and short vehicle queues. Sight distance at the project driveway would be adequate provided (1) the landscaping is kept at a low level within 10 feet of the curb face on El Camino Real and (2) sight distance is not blocked by parked vehicles. Parking should be prohibited on El Camino Real within 10 feet west of the driveway.
- The project would exceed the bike parking standards recommended by VTA.

Sincerely,

HEXAGON TRANSPORTATION CONSULTANTS, INC.

Gary K. Black President

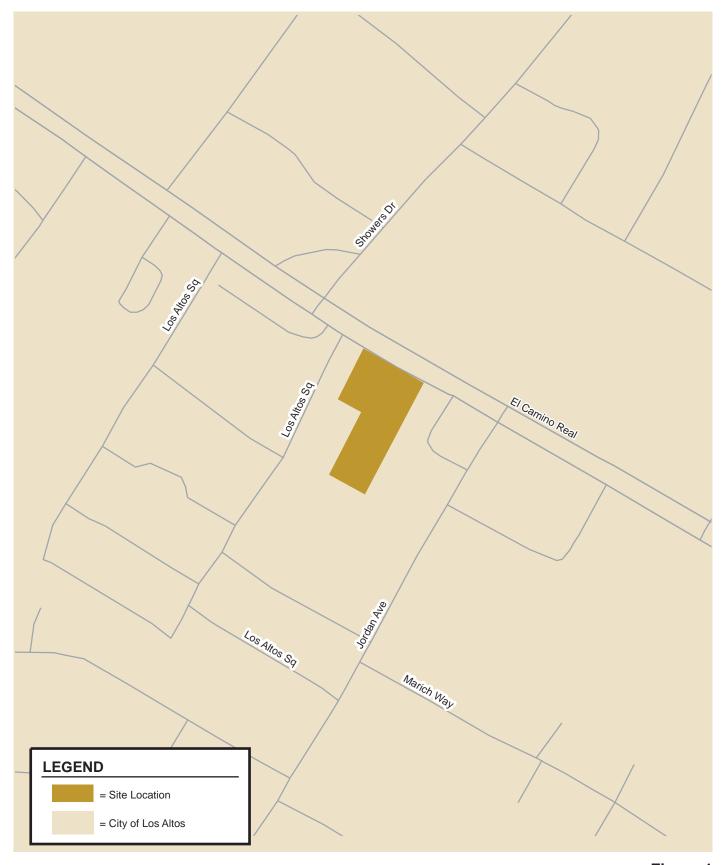
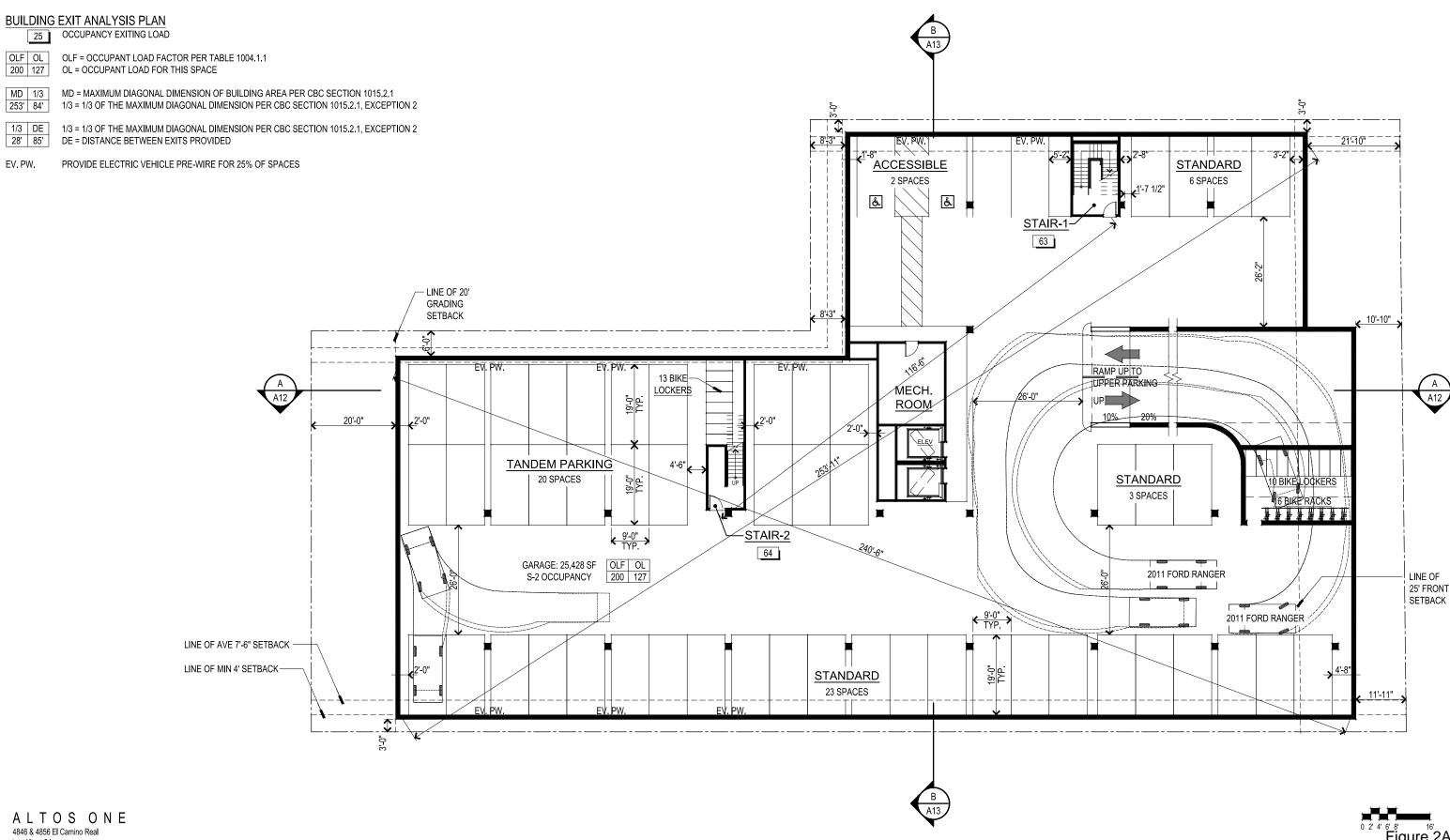


Figure 1 Site Location





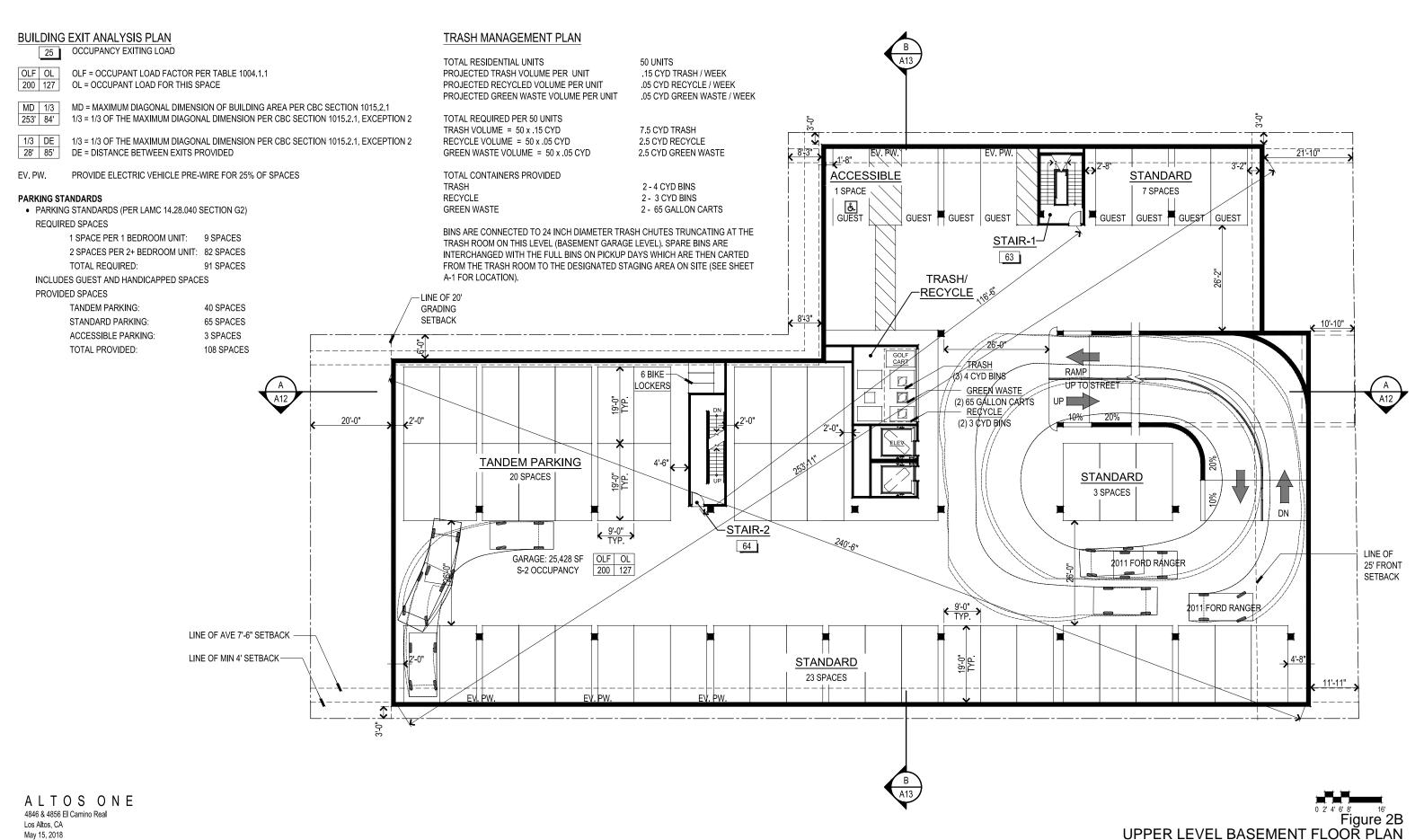


Los Altos, CA

LUXONE LLC

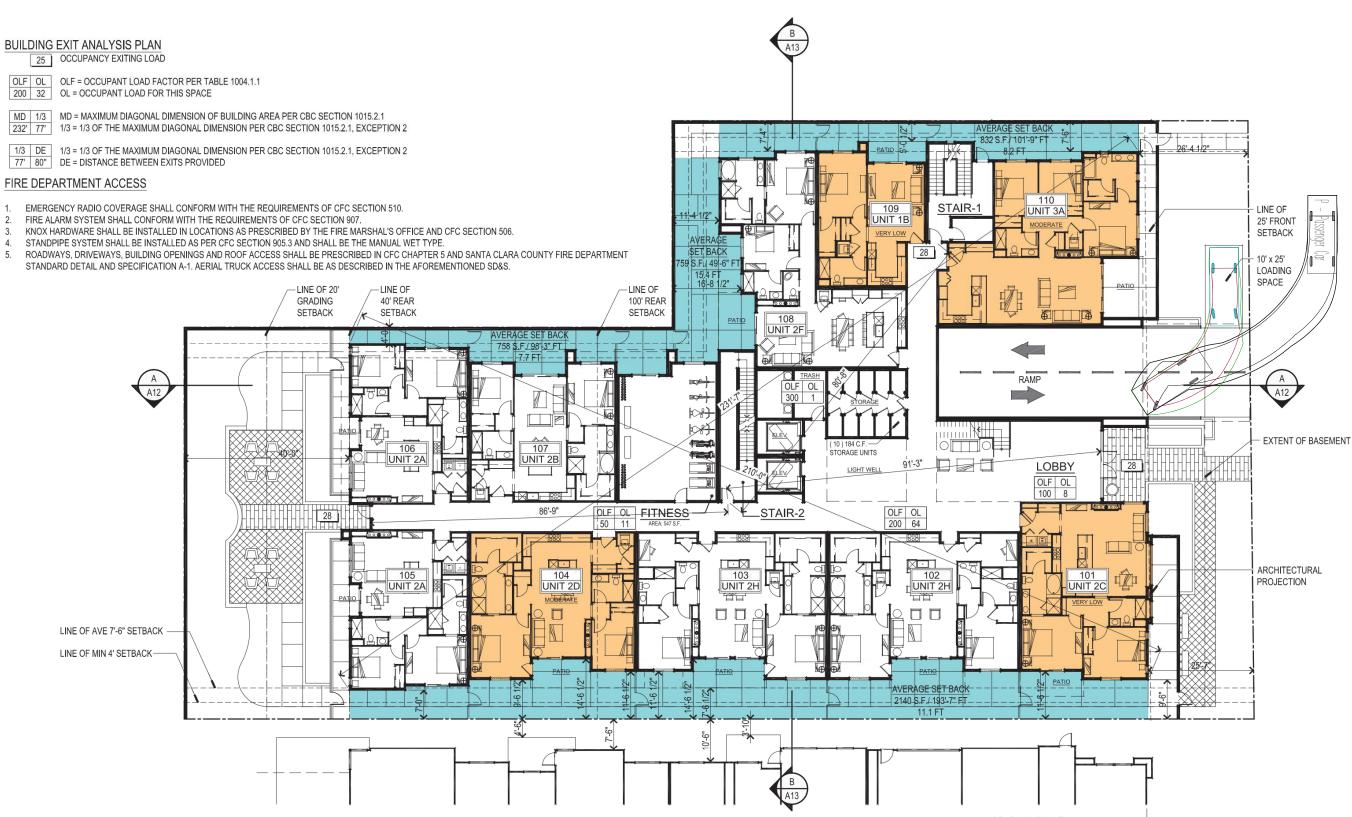
May 15, 2018

LOWER LEVEL BASEMENT FLOOR PLAN



LUXONE LLC

3361 Walnut Blvd. Suite 120 Brentwood, CA 94513 925.634.7000 www.straussdesign.com SDG Architects, Inc.



A L T O S O N E 4846 & 4856 El Camino Real

Los Altos, CA March 05, 2018

Los Altos, CA 94002

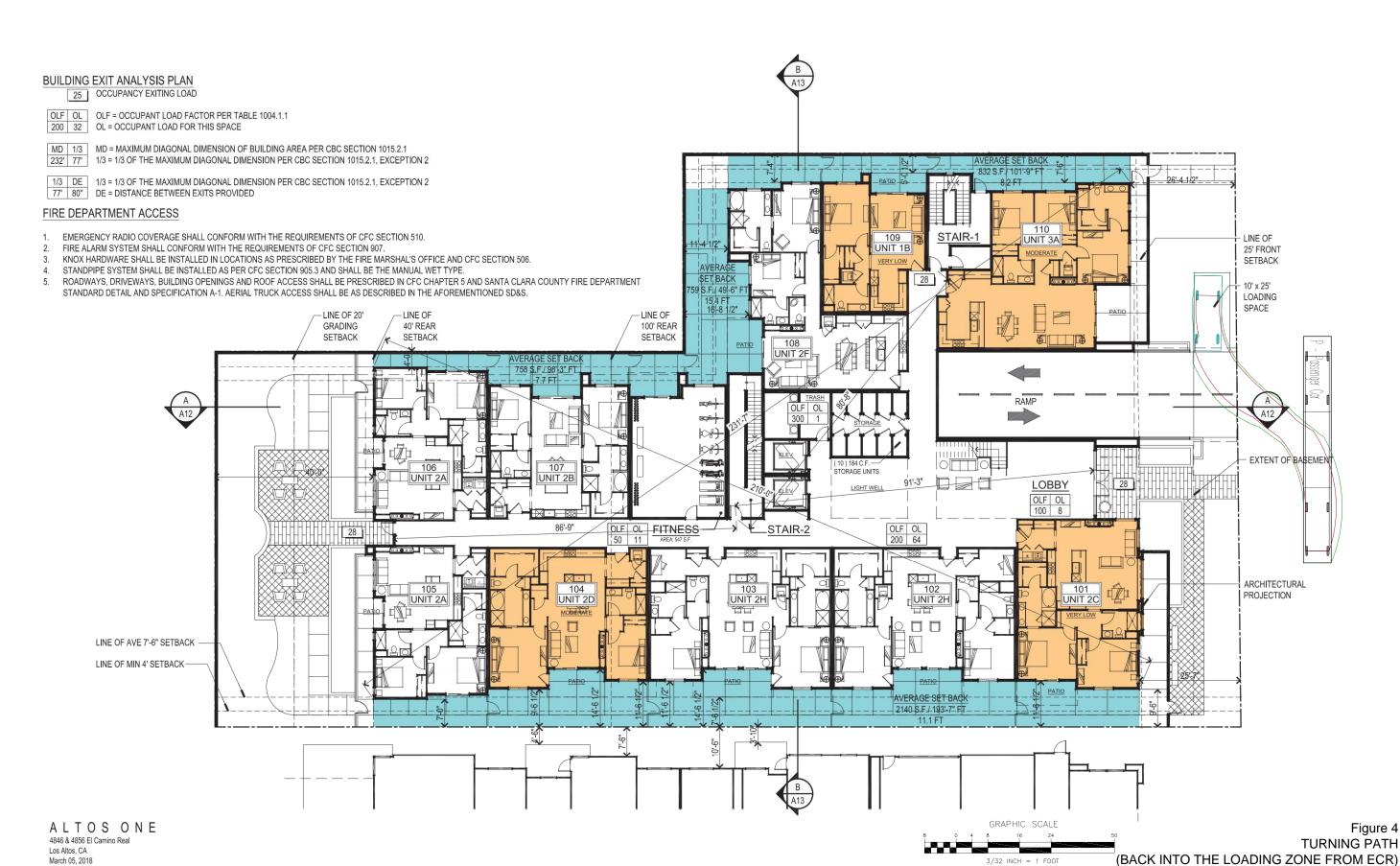
L U X O N E L L C 4856 El Camino Real Suite 100 (BACK INTO THE LOADING ZONE

3/32 INCH = 1 FOOT

Figure 3

TURNING PATH

FROM THE DRIVEWAY)



L U X O N E L L C

Los Altos, CA 94002

# ALTOS ONE PROJECT AIR QUALITY & GREENHOUSE GAS EMISSIONS ASSESSMENT

# Los Altos, California

March 15, 2017 Revised March 6, 2018

## Prepared for:

Zach Dahl City of Los Altos 1 North San Antonio Road Los Altos, CA 94022

## Prepared by:

Joshua D. Carman

ILLINGWORTH & RODKIN, INC.

| I Acoustics • Air Quality | III |

1 Willowbrook Court, Suite 120

Petaluma, CA 94954
(707) 794-0400

Project: 16-188

#### Introduction

The purpose of this report is to address air quality, toxic air contaminant (TAC), and greenhouse gas (GHG) emission impacts associated with the proposed Altos One residential project located at 4846/4856 El Camino Real in Los Altos, California. We understand that the project would demolish the on-site buildings and pavement and construct and operate up to 50 residential units. Air quality and GHG impacts could occur due to temporary construction emissions and as a result of direct and indirect emissions from new residences. The primary issue addressed in this air quality study is localized community risk impacts from emissions of project construction equipment and El Camino Real traffic. This analysis was conducted following guidance provided by the Bay Area Air Quality Management District (BAAQMD).

#### **Setting**

The project is located in Santa Clara County, which is in the San Francisco Bay Area Air Basin. Ambient air quality standards have been established at both the State and federal level. The Bay Area meets all ambient air quality standards with the exception of ground-level ozone, respirable particulate matter (PM<sub>10</sub>), and fine particulate matter (PM<sub>2.5</sub>).

#### Air Pollutants of Concern

High ozone levels are caused by the cumulative emissions of reactive organic gases (ROG) and nitrogen oxides (NOx). These precursor pollutants react under certain meteorological conditions to form high ozone levels. Controlling the emissions of these precursor pollutants is the focus of the Bay Area's attempts to reduce ozone levels. The highest ozone levels in the Bay Area occur in the eastern and southern inland valleys that are downwind of air pollutant sources. High ozone levels aggravate respiratory and cardiovascular diseases, reduced lung function, and increase coughing and chest discomfort.

Particulate matter is another problematic air pollutant of the Bay Area. Particulate matter is assessed and measured in terms of respirable particulate matter or particles that have a diameter of 10 micrometers or less (PM<sub>10</sub>) and fine particulate matter where particles have a diameter of 2.5 micrometers or less (PM<sub>2.5</sub>). Elevated concentrations of PM<sub>10</sub> and PM<sub>2.5</sub> are the result of both region-wide (or cumulative) emissions and localized emissions. High particulate matter levels aggravate respiratory and cardiovascular diseases, reduce lung function, increase mortality (e.g., lung cancer), and result in reduced lung function growth in children.

#### **Toxic Air Contaminants**

Toxic air contaminants (TAC) are a broad class of compounds known to cause morbidity or mortality (usually because they cause cancer) and include, but are not limited to, the criteria air pollutants. TACs are found in ambient air, especially in urban areas, and are caused by industry, agriculture, fuel combustion, and commercial operations (e.g., dry cleaners). TACs are typically found in low concentrations, even near their source (e.g., diesel particulate matter [DPM] near a freeway). Because chronic exposure can result in adverse health effects, TACs are regulated at the regional, State, and federal level.

Diesel exhaust is the predominant TAC in urban air and is estimated to represent about three-quarters of the cancer risk from TACs (based on the Bay Area average). According to the California Air Resources Board (CARB), diesel exhaust is a complex mixture of gases, vapors, and fine particles. This complexity makes the evaluation of health effects of diesel exhaust a complex scientific issue. Some of the chemicals in diesel exhaust, such as benzene and formaldehyde, have been previously identified as TACs by the CARB, and are listed as carcinogens either under the State's Proposition 65 or under the Federal Hazardous Air Pollutants programs.

CARB has adopted and implemented a number of regulations for stationary and mobile sources to reduce emissions of DPM. Several of these regulatory programs affect medium and heavy duty diesel trucks that represent the bulk of DPM emissions from California highways. These regulations include the solid waste collection vehicle (SWCV) rule, in-use public and utility fleets, and the heavy-duty diesel truck and bus regulations. In 2008, CARB approved a new regulation to reduce emissions of DPM and nitrogen oxides from existing on-road heavy-duty diesel fueled vehicles.<sup>1</sup> The regulation requires affected vehicles to meet specific performance requirements between 2014 and 2023, with all affected diesel vehicles required to have 2010 model-year engines or equivalent by 2023. These requirements are phased in over the compliance period and depend on the model year of the vehicle.

The BAAQMD is the regional agency tasked with managing air quality in the region. At the State level, the CARB (a part of the California Environmental Protection Agency [EPA]) oversees regional air district activities and regulates air quality at the State level. The BAAQMD has recently published California Environmental Quality Act (CEQA) Air Quality Guidelines that are used in this assessment to evaluate air quality impacts of projects.<sup>2</sup>

#### Sensitive Receptors

There are groups of people more affected by air pollution than others. CARB has identified the following persons who are most likely to be affected by air pollution: children under 16, the elderly over 65, athletes, and people with cardiovascular and chronic respiratory diseases. These groups are classified as sensitive receptors. Locations that may contain a high concentration of these sensitive population groups include residential areas, hospitals, daycare facilities, elder care facilities, elementary schools, and parks. The closest sensitive receptors are residences adjacent to the project site to the south. Additional residences are located to the south, west, and east.

#### Greenhouse Gases

Gases that trap heat in the atmosphere, GHGs, regulate the earth's temperature. This phenomenon, known as the greenhouse effect, is responsible for maintaining a habitable climate. The most common GHGs are carbon dioxide (CO<sub>2</sub>) and water vapor but there are also several others, most importantly methane (CH<sub>4</sub>), nitrous oxide (N<sub>2</sub>O), hydrofluorocarbons (HFCs), perfluorocarbons (PFCs), and sulfur hexafluoride (SF<sub>6</sub>). These are released into the earth's

<sup>&</sup>lt;sup>1</sup> Available online: <a href="http://www.arb.ca.gov/msprog/onrdiesel/onrdiesel.htm">http://www.arb.ca.gov/msprog/onrdiesel/onrdiesel.htm</a>. Accessed: June 9, 2015.

<sup>&</sup>lt;sup>2</sup> Bay Area Air Quality Management District, 2017. BAAQMD CEQA Air Quality Guidelines. May.

atmosphere through a variety of natural processes and human activities. Sources of GHGs are generally as follows:

- CO<sub>2</sub> and N<sub>2</sub>O are byproducts of fossil fuel combustion.
- N<sub>2</sub>O is associated with agricultural operations such as fertilization of crops.
- CH<sub>4</sub> is commonly created by off-gassing from agricultural practices (e.g., keeping livestock) and landfill operations.
- Chlorofluorocarbons (CFCs) were widely used as refrigerants, propellants, and cleaning solvents but their production has been stopped by international treaty.
- HFCs are now used as a substitute for CFCs in refrigeration and cooling.
- PFCs and sulfur hexafluoride emissions are commonly created by industries such as aluminum production and semi-conductor manufacturing.

Each GHG has its own potency and effect upon the earth's energy balance. This is expressed in terms of a global warming potential (GWP), with CO<sub>2</sub> being assigned a value of 1 and sulfur hexafluoride being several orders of magnitude stronger. In GHG emission inventories, the weight of each gas is multiplied by its GWP and is measured in units of CO<sub>2</sub> equivalents (CO<sub>2</sub>e).

An expanding body of scientific research supports the theory that global warming is currently affecting changes in weather patterns, average sea level, ocean acidification, chemical reaction rates, and precipitation rates, and that it will increasingly do so in the future. The climate and several naturally occurring resources within California could be adversely affected by the global warming trend. Increased precipitation and sea level rise could increase coastal flooding, saltwater intrusion, and degradation of wetlands. Mass migration and/or loss of plant and animal species could also occur. Potential effects of global climate change that could adversely affect human health include more extreme heat waves and heat-related stress; an increase in climate-sensitive diseases; more frequent and intense natural disasters such as flooding, hurricanes and drought; and increased levels of air pollution.

#### Significance Thresholds

In June 2010, BAAQMD adopted thresholds of significance to assist in the review of projects under CEQA. These Thresholds were designed to establish the level at which BAAQMD believed air pollution emissions would cause significant environmental impacts under CEQA and were posted on BAAQMD's website and included in the Air District's updated CEQA Guidelines (updated May 2017). The significance thresholds identified by BAAQMD and used in this analysis are summarized in Table 1.

Table 1. Air Quality Significance Thresholds

	Construction Thresholds	Operationa	l Thresholds				
Pollutant	Average Daily Emissions (lbs./day)	Average Daily Emissions (lbs./day)	Annual Average Emissions (tons/year)				
Criteria Air Pollutants							
ROG	54	54	10				
$NO_x$	54	54	10				
$PM_{10}$	82	82	15				
PM <sub>2.5</sub>	54	54	10				
СО	Not Applicable		erage) or 20.0 ppm (1- everage)				
Fugitive Dust	Construction Dust Ordinance or other Best Management Practices	Not Ap	pplicable				
Health Risks and Hazards	for Individual Sources						
Excess Cancer Risk	>1(	per one million					
Chronic or Acute Hazard Index		>1.0					
Incremental annual average PM <sub>2.5</sub>		>0.3 µg/m <sup>3</sup>					
Health Risks and Hazards zone of influence)	for Combined Sources (Cumul	ative from all sources	s within 1,000 foot				
Excess Cancer Risk	>10	0 per one million					
Chronic Hazard Index		>10.0					
Annual Average PM <sub>2.5</sub>		>0.8 μg/m <sup>3</sup>					
<b>Greenhouse Gas Emissions</b>	S						
GHG Annual Emissions	Compliance with a Qualified GHG Reduction Strategy OR 1,100 metric tons or 4.6 metric tons per capita						
an aerodynamic diameter of 10	gases, NOx = nitrogen oxides, $PM_{10}$ micrometers ( $\mu$ m) or less, $PM_{2.5}$ = fin or less; and $GHG$ = greenhouse gas	ne particulate matter or p					

BAAQMD's adoption of significance thresholds contained in the 2011 CEQA Air Quality Guidelines was called into question by an order issued March 5, 2012, in California Building Industry Association (CBIA) v. BAAQMD (Alameda Superior Court Case No. RGI0548693). In December 2015, the Supreme Court determined that an analysis of the impacts of the environment on a project – known as "CEQA-in-reverse" – is only required under two limited circumstances: (1) when a statute provides an express legislative directive to consider such impacts; and (2) when a proposed project risks exacerbating environmental hazards or conditions that already exist (Cal. Supreme Court Case No. S213478). Though not necessarily a CEQA issue, the potential risk impact of El Camino Real on future project residences is addressed to be

consistent with the Bay Area Clean Air Plan goal of reducing TAC exposure and protecting public health in the Bay Area.

#### **Impacts and Project Measures**

**Impact 1:** Conflict with or obstruct implementation of the applicable air quality plan? *No impact.* 

The most recent clean air plan is the *Bay Area 2017 Clean Air Plan* that was adopted by BAAQMD. The proposed project would not conflict with the latest Clean Air planning efforts since 1) the project would have emissions well below the BAAQMD thresholds (see Impact 2), 2) the project would be considered urban infill, 3) the project would be located near employment centers, and 4) the project would be located near transit with regional connections. The project is too small to exceed any of the significance thresholds and, thus, it is not required to incorporate project-specific transportation control measures listed in the latest Clean Air Plan.

Impact 2: Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable State or federal ambient air quality standard (including releasing emissions which exceed quantitative thresholds for ozone precursors)? Less than significant with construction period control measures.

The Bay Area is considered a non-attainment area for ground-level ozone and PM<sub>2.5</sub> under both the Federal Clean Air Act and the California Clean Air Act. The area is also considered non-attainment for PM<sub>10</sub> under the California Clean Air Act, but not the federal act. The area has attained both State and federal ambient air quality standards for carbon monoxide. As part of an effort to attain and maintain ambient air quality standards for ozone and PM<sub>10</sub>, the BAAQMD has established thresholds of significance for these air pollutants and their precursors. These thresholds are for ozone precursor pollutants (ROG and NOx), PM<sub>10</sub>, and PM<sub>2.5</sub> and apply to both construction period and operational period impacts.

Due to the project size, construction- and operational-period emissions would be less than significant. In the 2017 update to the CEQA Air Quality Guidelines, BAAQMD identifies screening criteria for the sizes of land use projects that could result in significant air pollutant emissions. For operational impacts, the screening project size is identified at 451 dwelling units. For construction impacts, the screening size is identified as 240 dwelling units. Condo/townhouse projects of smaller size would be expected to have less-than-significant impacts. Since the project proposes to develop up to 50 dwelling units, it is concluded that emissions would be below the BAAQMD significance thresholds. Stationary sources of air pollution (e.g., back-up generators) have not been identified with this project.

Construction activities, particularly during site preparation and grading would temporarily generate fugitive dust in the form of  $PM_{10}$  and  $PM_{2.5}$ . Sources of fugitive dust would include disturbed soils at the construction site and trucks carrying uncovered loads of soils. Unless properly controlled, vehicles leaving the site would deposit mud on local streets, which could be an additional source of airborne dust after it dries. Fugitive dust emissions would vary from day

to day, depending on the nature and magnitude of construction activity and local weather conditions. Fugitive dust emissions would also depend on soil moisture, silt content of soil, wind speed, and the amount of equipment operating. Larger dust particles would settle near the source, while fine particles would be dispersed over greater distances from the construction site. The BAAQMD CEQA Air Quality Guidelines consider these impacts to be less than significant if best management practices are employed to reduce these emissions. *Mitigation Measure 1 would implement BAAQMD-required best management practices*.

# Mitigation Measure 1: Include basic measures to control dust and exhaust during construction.

During any construction period ground disturbance, the applicant shall ensure that the project contractor implement measures to control dust and exhaust. Implementation of the measures recommended by BAAQMD and listed below would reduce the air quality impacts associated with grading and new construction to a less than significant level. The contractor shall implement the following best management practices that are required of all projects:

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

corrective action within 48 hours. The Air District's phone number shall also be visible to ensure compliance with applicable regulations.

**Impact 3:** Violate any air quality standard or contribute substantially to an existing or projected air quality violation? *Less than significant*.

As discussed under Impact 2, the project would have emissions less than the BAAQMD screening size for evaluating impacts related to ozone and particulate matter. Therefore, the project would not contribute substantially to existing or projected violations of those standards. Carbon monoxide emissions from traffic generated by the project would be the pollutant of greatest concern at the local level. Congested intersections with a large volume of traffic have the greatest potential to cause high-localized concentrations of carbon monoxide. Air pollutant monitoring data indicate that carbon monoxide levels have been at healthy levels (i.e., below State and federal standards) in the Bay Area since the early 1990s. As a result, the region has been designated as attainment for the standard. The highest measured level over any 8-hour averaging period during the last 3 years in the Bay Area is less than 3.0 parts per million (ppm), compared to the ambient air quality standard of 9.0 ppm. Intersections affected by the project would have traffic volumes less than the BAAQMD screening criteria and, thus, would not cause a violation of an ambient air quality standard or have a considerable contribution to cumulative violations of these standards.<sup>3</sup>

Impact 4: Expose sensitive receptors to substantial pollutant concentrations? Less than significant with operational and construction period control measures.

Project impacts related to increased community risk can occur either by introducing a new sensitive receptor, such as a residential use, in proximity to an existing source of TACs or by introducing a new source of TACs with the potential to adversely affect existing sensitive receptors in the project vicinity. The BAAQMD recommends using a 1,000-foot screening radius around a project site for purposes of identifying community health risk from siting a new sensitive receptor or a new source of TACs. Operation of the project is not expected to cause any localized emissions that could expose sensitive receptors to unhealthy air pollutant levels. No stationary sources of TACs, such as generators, are proposed as part of the project. The project would introduce new sensitive receptors to the area in the form of future residences. There are thresholds that address both the impact of single and cumulative TAC sources upon projects that include new sensitive receptors (see Table 1). Construction activity would generate dust and equipment exhaust on a temporary basis that could affect nearby sensitive receptors that include future planned residences.

## **Operational Community Risk Impacts**

The project would include new sensitive receptors. Substantial sources of air pollution can adversely affect sensitive receptors proposed as part of new projects. A review of the area indicates that El Camino Real (SR-82) is within 1,000 feet of the site and can adversely affect new residences. All other nearby roadways are assumed to have average daily traffic (ADT) of

<sup>&</sup>lt;sup>3</sup> For a land-use project type, the BAAQMD CEQA Air Quality Guidelines state that a proposed project would result in a less than significant impact to localized carbon monoxide concentrations if the project would not increase traffic at affected intersections with more than 44,000 vehicles per hour.

less than 10,000 and, according to BAAQMD guidance, would have a less than significant impact and are not discussed further. A review of BAAQMD's *Stationary Source Screening Analysis Tool* did not identify any stationary sources of TAC emissions within 1,000 feet that could adversely affect the project site.<sup>4</sup>

#### El Camino Real

Illingworth & Rodkin conducted refined analysis involved predicting community risk impacts El Camino Real traffic for the 4880 El Camino Real Project adjacent to the Altos One project in 2016. Emissions were input to the CAL3QHCR dispersion model to predict exposure to TACs. The associated cancer risk was computed based on the modeled exposures. Results of modeling indicated that while increased cancer risk would have a less than significant impact on project residences, annual PM2.5 concentrations could exceed the BAAQMD threshold of  $0.3~\mu g/m^3$  within 50 feet of the roadway. Mitigation Measure 2 would reduce the potential PM2.5 impact to a level of less than significant.

Mitigation Measure 2: The project shall include the following measures to minimize long-term toxic air contaminant (TAC) and annual PM<sub>2.5</sub> exposure for new project occupants:

The project should install air filtration at residential units within 50 feet of El Camino Real. To ensure adequate health protection to sensitive receptors, a ventilation system is proposed to meet the following minimal design standards:

- Air filtration devices shall be rated MERV13 or higher rating;
- At least one air exchange(s) per hour of fresh outside filtered air; and
- At least four air exchange(s) per hour recirculation.

As part of implementing this measure, an ongoing maintenance plan for the building's HVAC air filtration system will be developed. Recognizing that emissions from air pollution sources are decreasing, the maintenance period will last as long as significant annual PM<sub>2.5</sub> exposures are predicted. Subsequent studies could be conducted by an air quality expert approved by the City to identify the ongoing need for the filtered ventilation systems as future information becomes available.

In addition, it is important to ensure that the lease agreement and other property documents (1) require cleaning, maintenance, and monitoring of the affected units for air flow leaks; (2) include assurance that new tenants or owners are provided information on the ventilation system; and (3) include provisions that fees associated with owning or leasing a unit(s) in the building include funds for cleaning, maintenance, monitoring, and replacements of the filters, as needed.

 $<sup>^4</sup>$  See  $\underline{\text{http://www.baaqmd.gov/plans-and-climate/california-environmental-quality-act-ceqa/ceqa-tools}$ , accessed March 15, 2017.

<sup>&</sup>lt;sup>5</sup> Illingworth & Rodkin, Inc., 2016. 4880 El Camino Real Project Draft Air Quality 7 Greenhouse gas Emissions Assessment. March 18.

#### Effectiveness of Reduction Measure

The U.S. Environmental Protection Agency (EPA) reports particle size removal efficiency for filters rated MERV 13 of 90 percent for particles in the size range of 1 to 3 µm and less than 75 percent for particles 0.3 to 1 µm.<sup>6</sup> Studies by the South Coast AQMD indicate that MERV 13 filters could achieve reductions of about 60 percent for ultra-fine particles and about 35 percent for black carbon.<sup>7</sup>

A properly installed and operated ventilation system with MERV 13 air filters may reduce PM<sub>2.5</sub> concentrations from DPM mobile and stationary sources by approximately 60 to 70 percent indoors when compared to outdoors. The U.S. EPA reports that people, on average, spend 90 percent of their time indoors. The overall effectiveness calculations take into effect time spent outdoors and away from home. Assuming 60-percent effectiveness for this filtration, with 21 hours per day of exposure to filtered air and three hours per day to unfiltered air (uncontrolled or 0-percent effectiveness), the overall effectiveness of filtration systems would be about 53 percent. Therefore, with implementation of Mitigation Measure 2, this impact would be reduced to a level of less than significant.

#### Summary of Combined Community Risk

As discussed above, the project site is affected by El Camino Real. There are no other substantial sources of TACs within 1,000 feet of the project site. This would be a less than significant impact.

#### **Project Construction Activity**

Construction activities, particularly during site preparation and grading would temporarily generate fugitive dust in the form of respirable particulate matter (PM<sub>10</sub>) and PM<sub>2.5</sub>. Sources of fugitive dust would include disturbed soils at the construction site and trucks carrying uncovered loads of soils. Unless properly controlled, vehicles leaving the site would deposit mud on local streets, which could be an additional source of airborne dust after it dries. The BAAQMD CEQA Air Quality Guidelines consider these impacts to be less than significant if best management practices are employed to reduce these emissions. *Mitigation Measure 1 would implement BAAQMD-required best management practices*.

Construction equipment and associated heavy-duty truck traffic generates diesel exhaust, which is a known TAC. These exhaust air pollutant emissions would not be considered to contribute substantially to existing or projected air quality violations. Construction exhaust emissions may still pose community risks for sensitive receptors such as nearby residents. The primary

<sup>&</sup>lt;sup>6</sup> U.S. EPA 2009. Residential Air Cleaners Second Edition. A Summary of Available Information. Indoor Air Ouality (IAO). EPA 402-F-09-002 | Revised August 2009 | www.epa.gov/iaq

<sup>&</sup>lt;sup>7</sup> South Coast AQMD. 2009. *Pilot Study of High Performance Air Filtration for Classrooms Applications*. Draft – October.

<sup>&</sup>lt;sup>8</sup> Klepeis, N.E., Nelsen, WC., Ott, WR., Robinson, JP., Tsang, AM., Switzer, P., Behar, JV., Hern, SC., and Engelmann, WH. 2001. *The National Human Activity Pattern Survey (NHAPS): a resource for assessing exposure to environmental pollutants*. J. Expo Anal Environ Epidemial. 2001 May-Jun;11(3):231-52.

community risk impact issues associated with construction emissions are cancer risk and exposure to PM<sub>2.5</sub>. Diesel exhaust poses both a potential health and nuisance impact to nearby receptors. A community risk assessment of the project construction activities was conducted that evaluated potential health effects of sensitive receptors at these nearby residences from construction emissions of DPM and PM<sub>2.5</sub>. The closest sensitive receptors to the project site are residences adjacent to the southern boundary of the project site (see Figure 1). Emissions and dispersion modeling was conducted to predict the off-site DPM concentrations resulting from project construction, so that lifetime cancer risks and non-cancer health effects could be evaluated.

#### **Construction Period Emissions**

The California Emissions Estimator Model (CalEEMod) Version 2016.3.2 was used to estimate annual emissions for construction. CalEEMod provides emission estimates for both on-site and off-site construction activities. On-site activities are primarily made up of construction equipment emissions, while off-site activity includes worker, hauling, and vendor traffic. The proposed project land uses were input into CalEEMod, which included 50 dwelling units entered as "Condo/Townhouse," and 112 parking spaces entered as "Enclosed Parking" on a 0.73-acre site. A construction build-out scenario, including equipment list and phasing schedule was based on model defaults for a project of this type and size and a construction start date of April 2019. It is expected that 21,280 cubic yards of soil export will be necessary, which was entered into the model. In addition, 30,500 sf of building and pavement demolition is anticipated. *Attachment 1* includes the detailed risk modeling methodology and *Attachment 2* includes the CalEEMod input and output values for construction emissions.

The CalEEMod model provided total annual PM<sub>10</sub> exhaust emissions (assumed to be DPM) for the off-road construction equipment and for exhaust emissions from on-road vehicles, with total emissions from all construction stages of 0.0354 tons (71 pounds). The on-road emissions are a result of haul truck travel during demolition and grading activities, worker travel, and vendor deliveries during construction. It was assumed that these emissions from on-road vehicles traveling at or near the site would occur at the construction site. Fugitive PM<sub>2.5</sub> dust emissions were calculated by CalEEMod as 7 pounds for the overall construction period. For the purpose of estimating risk levels at or near the site, the CalEEMod modeling included emissions from truck and worker travel, assumed to occur over a distance of one half mile at or near the site.

#### Dispersion Modeling

The U.S. EPA AERMOD dispersion model was used to predict concentrations of DPM and PM<sub>2.5</sub> concentrations at existing sensitive receptors (residences) in the vicinity of the project site. The AERMOD modeling utilized two area sources to represent the on-site construction emissions, one for DPM exhaust emissions and the other for fugitive PM<sub>2.5</sub> dust emissions. To represent the construction equipment exhaust emissions, an emission release height of six meters was used for the area source. The elevated source height reflects the height of the equipment exhaust pipes and buoyancy of the exhaust plume. For modeling fugitive PM<sub>2.5</sub> emissions, a near ground level release height of two meters was used for the area source. Emissions from

<sup>&</sup>lt;sup>9</sup> DPM is identified by California as a toxic air contaminant due to the potential to cause cancer.

vehicle travel around the project site were included in the modeled area sources. Construction emissions were modeled as occurring daily between 7 a.m. - 4 p.m.

The modeling used a five-year data set (2009 - 2013) of hourly meteorological data from Moffett Field prepared for use with the AERMOD model by the CARB. Annual DPM and PM<sub>2.5</sub> concentrations from construction activities in 2019 were calculated using the model. DPM and PM<sub>2.5</sub> concentrations were calculated at nearby residential locations. Receptor heights of 1.5 meters (4.9 feet) and 4.5 meters (14.8 feet) were used in the modeling to represent the breathing heights of nearby first and second floor residences. Figure 1 shows the construction area modeled, and locations of nearby residential receptors.

#### Predicted Cancer Risk and Hazards

The maximum-modeled DPM and PM<sub>2.5</sub> concentrations occurred at a residence just east of the project site. Using the maximum annual modeled DPM concentrations, the maximum increased cancer risks were calculated using the methods previously described. Due to the short anticipated duration of project construction activities (less than one year), infant exposures were assumed in calculating cancer risks for residential exposures. Because an infant (0 to 2 years of age) has a breathing rate that is greater than the breathing rate for the 3<sup>rd</sup> trimester the contribution to total cancer risk from an infant exposure is greater than if the initial exposure assumed for the 3<sup>rd</sup> trimester is assumed. It was conservatively assumed that an infant exposure to construction emissions would occur over the entire construction period.

Results of this assessment indicate that the maximum increased residential cancer risks would be 36.6 in one million for an infant exposure and 0.8 in one million for an adult exposure. The location of the receptor with the maximum increased cancer risk is shown in Figure 1. The maximum residential excess cancer risk would be greater than the BAAQMD significance threshold of 10 in one million and would be considered a *significant impact* 

The maximum-modeled annual PM<sub>2.5</sub> concentration, which is based on combined exhaust and fugitive dust emissions, was  $0.3~\mu g/m^3$ , occurring at a residence adjacent to where the maximum cancer risk would occur. This annual PM<sub>2.5</sub> concentration would not be greater than the BAAQMD significance threshold of  $0.3~\mu g/m^3$  and would be considered a *less-than-significant impact*.

The maximum modeled annual residential DPM concentration (i.e., from construction exhaust) was  $0.2623 \,\mu\text{g/m}^3$ . The maximum computed HI based on this DPM concentration is 0.05, which is lower than the BAAQMD significance criterion of a HI greater than 1.0.

The project would have a *significant impact* with respect to community risk caused by construction activities. *Implementation of Mitigation Measures 1 and 3 would reduce this impact to a level of less than significant.* 

Attachment 2 includes the emission calculations used for the area source modeling and the cancer risk calculations.

# Mitigation Measure 3: Selection of equipment during construction to minimize emissions. Such equipment selection would include the following:

All diesel-powered off-road equipment operating on the site for more than two days continuously shall, at a minimum, meet U.S. EPA particulate matter emissions standards for Tier 4 engines or equivalent. Note that the construction contractor could use other measures to minimize construction period DPM emission to reduce the predicted cancer risk below the thresholds. The use of equipment that includes Tier 2 engines and CARB-certified Level 3 Diesel Particulate Filters<sup>10</sup> or alternatively-fueled equipment (i.e., non-diesel) would also meet this requirement. Other measures may be the use of added exhaust devices, or a combination of measures, provided that these measures are approved by the City and demonstrated to reduce community risk impacts to less than significant.

Implementation of *Mitigation Measure 1* is considered to reduce exhaust emissions by 5 percent and fugitive dust emissions by over 50 percent. Implementation of *Mitigation Measure 3* would further reduce on-site diesel exhaust emissions. With mitigation, the computed maximum increased cancer risk for construction would be 3.9 in one million or less. The cancer risk would be below the BAAQMD thresholds of greater than 10 per one million for cancer risk. Therefore, *after implementation of these recommended measures, the project would have a less-than-significant impact with respect to community risk caused by construction activities*.

<sup>&</sup>lt;sup>10</sup> See <a href="http://www.arb.ca.gov/diesel/verdev/vt/cvt.htm">http://www.arb.ca.gov/diesel/verdev/vt/cvt.htm</a>

Figure 1. Project Construction Site, Locations of Off-Site Sensitive Receptors and Maximum TAC Impact El Camino Real Risk MEI Legend Receptors ■ Project Site 82017 idlerosoù Corpordon 82010 NAVES 8AND 0 40 80 160 240 320 Feet

# Impact 5: Create objectionable odors affecting a substantial number of people? Less than significant.

The project would generate localized emissions of diesel exhaust during construction equipment operation and truck activity. These emissions may be noticeable from time to time by adjacent receptors. However, they would be localized and are not likely to adversely affect people off site by resulting in confirmed odor complaints. The project would not include any sources of significant odors that would cause complaints from surrounding uses. This would be a *less-than-significant impact* 

**Impact 6:** Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment? **Less than significant.** 

GHG emissions associated with development of the proposed project would occur over the short-term from construction activities, consisting primarily of emissions from equipment exhaust and worker and vendor trips. There would also be long-term operational emissions associated with vehicular traffic within the project vicinity, energy and water usage, and solid waste disposal. Emissions for the proposed project are discussed below and were analyzed using the methodology recommended in the BAAQMD CEQA Air Quality Guidelines.<sup>11</sup>

#### Construction Phase

Neither the City nor BAAQMD have an adopted threshold of significance for construction-related GHG emissions, though BAAQMD recommends quantifying emissions and disclosing that GHG emissions would occur during construction. BAAQMD also encourages the incorporation of best management practices to reduce GHG emissions during construction where feasible and applicable. Best management practices assumed to be incorporated into construction of the proposed project include, but are not limited to: using local building materials of at least 10 percent and recycling or reusing at least 50 percent of construction waste or demolition materials.

#### Operational Impacts

Due to the project size, operational period GHG emissions would be less than significant. In their May 2017 update to the CEQA Air Quality Guidelines, BAAQMD identified screening criteria for the sizes of land use projects that could result in significant GHG emissions. For operational impacts, the screening project size is identified at 78 dwelling units. Condo/townhouse projects of smaller size would be expected to have less-than-significant impacts with respect to operational period GHG emissions. Since the project proposes to operate 50 dwelling units, it is concluded that emissions would be below the BAAQMD significance threshold of 1,100 MT of CO2e annually and, therefore, this impact is considered *less than significant*.

\_

<sup>&</sup>lt;sup>11</sup> BAAQMD, 2017. *Op cit*.

**Impact 7:** Conflict with an applicable plan, policy, or regulation adopted for the purpose of reducing the emissions of greenhouse gases? *Less than significant*.

AB 32, the Global Warming Solutions Act of 2006, codifies the State of California's GHG emissions target by directing CARB to reduce the state's global warming emissions to 1990 levels by 2020. AB 32 was signed and passed into law by Governor Schwarzenegger on September 27, 2006. Since that time, CARB, CEC, the California Public Utilities Commission (CPUC), and the Building Standards Commission have all been developing regulations that will help meet the goals of AB 32 and Executive Order S-3-05.

A Scoping Plan for AB 32 was adopted by CARB in December 2008. It contains the State of California's main strategies to reduce GHGs from BAU emissions projected in 2020 back down to 1990 levels. BAU is the projected emissions in 2020, including increases in emissions caused by growth, without any GHG reduction measures. The Scoping Plan has a range of GHG reduction actions, including direct regulations, alternative compliance mechanisms, monetary and non-monetary incentives, voluntary actions, and market-based mechanisms such as a capand-trade system. It required CARB and other state agencies to develop and adopt regulations and other initiatives reducing GHGs by 2012.

As directed by AB 32, CARB has also approved a statewide GHG emissions limit. On December 6, 2007, CARB staff resolved an amount of 427 MMT of CO<sub>2</sub>e as the total statewide GHG 1990 emissions level and 2020 emissions limit. The limit is a cumulative statewide limit, not a sector-or facility-specific limit. CARB updated the future 2020 BAU annual emissions forecast, in light of the economic downturn, to 545 MMT of CO<sub>2</sub>e. Two GHG emissions reduction measures currently enacted that were not previously included in the 2008 Scoping Plan baseline inventory were included, further reducing the baseline inventory to 507 MMT of CO<sub>2</sub>e. Thus, an estimated reduction of 80 MMT of CO<sub>2</sub>e is necessary to reduce statewide emissions to meet the AB 32 target by 2020.

SB 32 was passed in 2016, which codified a 2030 GHG emissions reduction target of 40 percent below 1990 levels. CARB published on a second update to the Scoping Plan to reflect the 2030 target set by Executive Order B-30-15 and codified by SB 32. The proposed Scoping Plan Update was published in November 2017 as directed by SB 32 companion legislation AB 197. The mid-term 2030 target is considered critical by CARB on the path to obtaining an even deeper GHG emissions target of 80 percent below 1990 levels by 2050, as directed in Executive Order S-3-05. The Scoping Plan outlines the suite of policy measures, regulations, planning efforts, and investments in clean technologies and infrastructure, providing a blueprint to continue driving down GHG emissions and obtain the statewide goals.

The proposed project would not conflict or otherwise interfere with the statewide GHG reduction measures identified in CARB's Scoping Plan. The project would comply with requirements of the Green Building Code. For example, proposed buildings would be constructed in conformance with CALGreen and the Title 24 Building Code, which requires high-efficiency water fixtures and water-efficient irrigation systems.

### **Attachment 1: Health Risk Calculation Methodology**

A health risk assessment (HRA) for exposure to Toxic Air Contaminates (TACs) requires the application of a risk characterization model to the results from the air dispersion model to estimate potential health risk at each sensitive receptor location. The State of California Office of Environmental Health Hazard Assessment (OEHHA) and California Air Resources Board (CARB) develop recommended methods for conducting health risk assessments. The most recent OEHHA risk assessment guidelines were published in February of 2015. These guidelines incorporate substantial changes designed to provide for enhanced protection of children, as required by State law, compared to previous published risk assessment guidelines. CARB has provided additional guidance on implementing OEHHA's recommended methods. This HRA used the recent 2015 OEHHA risk assessment guidelines and CARB guidance. The BAAQMD has adopted recommended procedures for applying the newest OEHHA guidelines as part of Regulation 2, Rule 5: New Source Review of Toxic Air Contaminants. Exposure parameters from the OEHHA guidelines and the recent BAAQMD HRA Guidelines were used in this evaluation.

#### Cancer Risk

Potential increased cancer risk from inhalation of TACs are calculated based on the TAC concentration over the period of exposure, inhalation dose, the TAC cancer potency factor, and an age sensitivity factor to reflect the greater sensitivity of infants and children to cancer causing TACs. The inhalation dose depends on a person's breathing rate, exposure time and frequency of exposure, and the exposure duration. These parameters vary depending on the age, or age range, of the persons being exposed and whether the exposure is considered to occur at a residential location or other sensitive receptor location.

The current OEHHA guidance recommends that cancer risk be calculated by age groups to account for different breathing rates and sensitivity to TACs. Specifically, they recommend evaluating risks for the third trimester of pregnancy to age zero, ages zero to less than two (infant exposure), ages two to less than 16 (child exposure), and ages 16 to 70 (adult exposure). Age sensitivity factors (ASFs) associated with the different types of exposure are an ASF of 10 for the third trimester and infant exposures, an ASF of 3 for a child exposure, and an ASF of 1 for an adult exposure. Also associated with each exposure type are different breathing rates, expressed as liters per kilogram of body weight per day (L/kg-day). As recommended by the BAAQMD, 95<sup>th</sup> percentile breathing rates are used for the third trimester and infant exposures, and 80<sup>th</sup> percentile breathing rates for child and adult exposures. Additionally, CARB and the BAAQMD recommend the use of a residential exposure duration of 30 years for sources with long-term emissions (e.g., roadways).

<sup>&</sup>lt;sup>12</sup> OEHHA, 2015. Air Toxics Hot Spots Program Risk Assessment Guidelines, The Air Toxics Hot Spots Program Guidance Manual for Preparation of Health Risk Assessments. Office of Environmental Health Hazard Assessment. February.

<sup>&</sup>lt;sup>13</sup> CARB, 2015. Risk Management Guidance for Stationary Sources of Air Toxics. July 23.

<sup>&</sup>lt;sup>14</sup>BAAQMD, 2016. BAAQMD Air Toxics NSR Program Health Risk Assessment (HRA) Guidelines. January 2016.

Under previous OEHHA and BAAQMD HRA guidance, residential receptors are assumed to be at their home 24 hours a day, or 100 percent of the time. In the 2015 Risk Assessment Guidance, OEHHA includes adjustments to exposure duration to account for the fraction of time at home (FAH), which can be less than 100 percent of the time, based on updated population and activity statistics. The FAH factors are age-specific and are: 0.85 for third trimester of pregnancy to less than 2 years old, 0.72 for ages 2 to less than 16 years, and 0.73 for ages 16 to 70 years. Use of the FAH factors is allowed by the BAAQMD if there are no schools in the project vicinity that would have a cancer risk of one in a million or greater assuming 100 percent exposure (FAH = 1.0).

Functionally, cancer risk is calculated using the following parameters and formulas:

Cancer Risk (per million) = CPF x Inhalation Dose x ASF x ED/AT x  $FAH x 10^6$  Where:

 $CPF = Cancer potency factor (mg/kg-day)^{-1}$ 

ASF = Age sensitivity factor for specified age group

ED = Exposure duration (years)

AT = Averaging time for lifetime cancer risk (years)

FAH = Fraction of time spent at home (unitless)

Inhalation Dose =  $C_{air} x DBR x A x (EF/365) x 10^{-6}$ Where:

 $C_{air} = concentration in air (\mu g/m^3)$ 

DBR = daily breathing rate (L/kg body weight-day)

A = Inhalation absorption factor

EF = Exposure frequency (days/year)

 $10^{-6}$  = Conversion factor

The health risk parameters used in this evaluation are summarized as follows:

	Exposure Type >	Infar	ıt	Ch	ild	Adult
Parameter	Age Range >	3 <sup>rd</sup> Trimester	0<2	2 < 9	16 - 30	
DPM Cancer Potency F	factor (mg/kg-day) <sup>-1</sup>	1.10E+00	1.10E+00	1.10E+00	1.10E+00	1.10E+00
Daily Breathing Rate (I	/kg-day)*	361	1,090	631	572	261
Inhalation Absorption F	actor	1	1	1	1	1
Averaging Time (years)		70	70	70	70	70
Exposure Duration (year	ars)	0.25	2	14	14	14
Exposure Frequency (d	ays/year)	350	350	350	350	350
Age Sensitivity Factor		10	10	3	3	1
Fraction of Time at Hor	me	0.85-1.0	0.85-1.0	0.72-1.0	0.72-1.0	0.73

<sup>\* 95</sup>th percentile breathing rates for 3rd trimester and infants and 80th percentile for children and adults

#### Non-Cancer Hazards

Potential non-cancer health hazards from TAC exposure are expressed in terms of a hazard index (HI), which is the ratio of the TAC concentration to a reference exposure level (REL). OEHHA has defined acceptable concentration levels for contaminants that pose non-cancer health hazards. TAC concentrations below the REL are not expected to cause adverse health impacts, even for sensitive individuals. The total HI is calculated as the sum of the HIs for each TAC evaluated and the total HI is compared to the BAAQMD significance thresholds to determine whether a significant non-cancer health impact from a project would occur.

Typically, for residential projects located near roadways with substantial TAC emissions, the primary TAC of concern with non-cancer health effects is diesel particulate matter (DPM). For DPM, the chronic inhalation REL is 5 micrograms per cubic meter ( $\mu g/m^3$ ).

#### Annual PM<sub>2.5</sub> Concentrations

While not a TAC, fine particulate matter (PM<sub>2.5</sub>) has been identified by the BAAQMD as a pollutant with potential non-cancer health effects that should be included when evaluating potential community health impacts under the California Environmental Quality Act (CEQA). The thresholds of significance for PM<sub>2.5</sub> (project level and cumulative) are in terms of an increase in the annual average concentration. When considering PM<sub>2.5</sub> impacts, the contribution from all sources of PM<sub>2.5</sub> emissions should be included. For projects with potential impacts from nearby local roadways, the PM<sub>2.5</sub> impacts should include those from vehicle exhaust emissions, PM<sub>2.5</sub> generated from vehicle tire and brake wear, and fugitive emissions from re-suspended dust on the roads.

Attachment 2: Construction Schedule, CalEEMod Input and Output Worksheets, and Risk Calculations

Project Name Project  Constru  Qty  Demolit	ct Size cruction Hours Description	50 88,919	Dwelling Units s.f. residential s.f. parking garage am to Load Factor	0.725 112	spaces	acres distur	bed				
Constru	ruction Hours  Description	88,919 50,856	s.f. residential s.f. parking garage am to	112	spaces	acres distur	bed				
Constru	ruction Hours  Description	88,919 50,856	s.f. residential s.f. parking garage am to	112	spaces	acres distur	bed				
Constru	ruction Hours  Description	88,919 50,856	s.f. residential s.f. parking garage am to	112	spaces	acres distur	bed				
Constru	ruction Hours  Description	88,919 50,856	s.f. residential s.f. parking garage am to	112	spaces	acres distur	bed				
Constru	ruction Hours  Description	88,919 50,856	s.f. residential s.f. parking garage am to	112	spaces	t acres distur	bed				
Qty	Description	50,856	s.f. parking garage am to		pm	-					
Qty	Description	50,856	s.f. parking garage am to		pm	- ]					
Qty	Description		am to		pm	]					
Qty	Description		am to		pm						1
Qty	Description	НР							1		
Qty	Description	НР									
-	·	НР	Load Factor		Total	Avg.					
-	·	HP	Load Factor		Work	Hours per	Annual				
Demolit	lition			Hours/day	Days	day	Hours	Comments			
Demolit	lition			-					1		
H 1		Start Date:	4/1/2019	Total phase:	10			Overall Import/Export Volumes			
1		End Date:	4/12/2019	•		1		r received			
1 Concret	ete/Industrial Saws	81	0.73	8	10	Я	80	Demolition Volume	1		<del></del>
	er-Tired Dozers	247	0.4	1	10		10		1		
	rs/Loaders/Backhoes	97	0.37	6	10		120		1		
2	. o, 2000 o, 0, 200 i i i o o o	0.	0.01			Ů	.20		20.50	0 sf of hards	scape
									20,00	7	Joapo
Site Pre	reperation	Start Date:	4/13/2019	Total phase:	1			Any pavement demolished and hauled? _?_tons			
		End Date:	4/15/2019	,	_						
1 Graders		174	0.41	8	1	8	8				
	rs/Loaders/Backhoes	97	0.37	8		8	8				
					-		_				
Grading	ng / Excavation	Start Date:	4/16/2019	Total phase:	2						
		End Date:	4/17/2019	,	_			Soil Hauling Volume		<del></del>	-
1 Concret	ete/Industrial Saws	81	0.73	8	2	0	16		_		
	er Tired Dozers	247	0.73	0	2	0	2	Import volume = <u>21,200</u> cubic yards?	-		
	rs/Loaders/Backhoes	97	0.4	6	2	6	24				-
2 Huotoro	no/Edddolo/Bdoknood	01	0.01		_	Ŭ	2-1		1		
									1		
Buildin	ng - Exterior	Start Date:	4/18/2019	Total phase:	100			Cement Trucks? _?_ Total Round-Trips			
		End Date:	9/4/2019	,	144			<del></del>			
1 Cranes	S	231	0.29	4	100	4	400	Electric? (Y/N) Otherwise assumed diesel	1		
2 Forklifts		89	0.2	6			1200		1		
	rs/Loaders/Backhoes	97	0.37	8			1600				
Building - Interior/	r/Architectural Coating	Start Date:		Total phase:	5						
		End Date:	9/18/2019								
1 Air Com	mpressors	78	0.48	6	5	6	30				
			·								
Paving	3	Start Date:	9/5/2019	Total phase:	5					<sub>i</sub>	1
		Start Date:	9/11/2019								
4 Cement	nt and Mortar Mixers	9	0.56	6	5	6	120	120			
1 Pavers		130	0.42	7	5	-	35	Asphalt? cubic yards or round trips?			
1 Rollers		80	0.38	7	5		35				
	rs/Loaders/Backhoes	97	0.37	7	5		35				
·		Ŭ.	0.0.	•	Ĭ	<u> </u>	- 00				

CalEEMod Version: CalEEMod.2016.3.2

Page 1 of 1

Date: 3/6/2018 2:10 PM

4846/4856 ECR Construction TAC - Santa Clara County, Annual

# 4846/4856 ECR Construction TAC, Tier 2 w DPF Level 3 Santa Clara County, Annual

### 1.0 Project Characteristics

#### 1.1 Land Usage

Land Uses	Size	Metric	Lot Acreage	Floor Surface Area	Population
Enclosed Parking Structure	112.00	Space	0.00	50,856.00	0
Condo/Townhouse	50.00	Dwelling Unit	0.73	88,919.00	143

#### 1.2 Other Project Characteristics

Urbanization	Urban	Wind Speed (m/s)	2.2	Precipitation Freq (Days)	58
Climate Zone	4			Operational Year	2020
Utility Company	Pacific Gas & Electr	ic Company			
CO2 Intensity (lb/MWhr)	641.35	CH4 Intensity (lb/MWhr)	0.029	N2O Intensity 0 (lb/MWhr)	.006

#### 1.3 User Entered Comments & Non-Default Data

Project Characteristics -

Land Use - from "\_\_18-03-05 Mohr Clock DRB\_Lores.pdf" plan set

Construction Phase - Construction start date April 2019, default phase durations for a project of this type and size

Trips and VMT - 0.5mi trip lengths for TAC

Demolition - 10,000sf bldg demo, 20,500sf hardscape

Grading - 21,280 cy export

Construction Off-road Equipment Mitigation - Tier 2 engines, DPF Level 3 for equip >25hp. BAAQMD BMPs.

Table Name	Column Name	Default Value	New Value		
tblConstDustMitigation	WaterUnpavedRoadVehicleSpeed	0	15		
tblConstEquipMitigation	DPF	No Change	Level 3		
tblConstEquipMitigation	DPF	No Change	Level 3		
tblConstEquipMitigation	DPF	No Change	Level 3		
tblConstEquipMitigation	DPF	No Change	Level 3		
tblConstEquipMitigation	DPF	No Change	Level 3		
tblConstEquipMitigation	DPF	No Change	Level 3		
tblConstEquipMitigation	DPF	No Change	Level 3		
tblConstEquipMitigation	DPF	No Change	Level 3		
tblConstEquipMitigation	DPF	No Change	Level 3		
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	1.00		
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	2.00		
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	1.00		
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	2.00		
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	1.00		
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	1.00		
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	1.00		
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	2.00		
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	8.00		
tblConstEquipMitigation	Tier	No Change	Tier 2		
tblConstEquipMitigation	Tier	No Change	Tier 2		
tblConstEquipMitigation	Tier	No Change	Tier 2		
tblConstEquipMitigation	Tier	No Change	Tier 2		
tblConstEquipMitigation	Tier	No Change	Tier 2		
tblConstEquipMitigation	Tier	No Change	Tier 2		
tblConstEquipMitigation	Tier	No Change	Tier 2		
tblConstEquipMitigation	Tier	No Change	Tier 2		
tblConstEquipMitigation	Tier	No Change	Tier 2		
tblGrading	MaterialExported	0.00	21,280.00		

tblLandUse	LandUseSquareFeet	44,800.00	50,856.00
tblLandUse	LandUseSquareFeet	50,000.00	88,919.00
tblLandUse	LotAcreage	1.01	0.00
tblLandUse	LotAcreage	3.13	0.73
tblTripsAndVMT	HaulingTripLength	20.00	0.50
tblTripsAndVMT	HaulingTripLength	20.00	0.50
tblTripsAndVMT	HaulingTripLength	20.00	0.50
tblTripsAndVMT	HaulingTripLength	20.00	0.50
tblTripsAndVMT	HaulingTripLength	20.00	0.50
tblTripsAndVMT	HaulingTripLength	20.00	0.50
tblTripsAndVMT	VendorTripLength	7.30	0.50
tblTripsAndVMT	VendorTripLength	7.30	0.50
tblTripsAndVMT	VendorTripLength	7.30	0.50
tblTripsAndVMT	VendorTripLength	7.30	0.50
tblTripsAndVMT	VendorTripLength	7.30	0.50
tblTripsAndVMT	VendorTripLength	7.30	0.50
tblTripsAndVMT	WorkerTripLength	10.80	0.50
tblTripsAndVMT	WorkerTripLength	10.80	0.50
tblTripsAndVMT	WorkerTripLength	10.80	0.50
tblTripsAndVMT	WorkerTripLength	10.80	0.50
tblTripsAndVMT	WorkerTripLength	10.80	0.50
tblTripsAndVMT	WorkerTripLength	10.80	0.50

# 2.0 Emissions Summary

# 2.1 Overall Construction <a href="Unmitigated Construction">Unmitigated Construction</a>

R	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
---	-----	-----	----	-----	------------------	-----------------	---------------	-------------------	------------------	----------------	----------	--------------	-----------	-----	-----	------

Year		tons/yr										MT/yr					
2019	0.7011	0.7613	0.5036	9.1000e- 004	0.0193	0.0354	0.0547	3.4700e- 003	0.0327	0.0362	0.0000	82.8619	82.8619	0.0210	0.0000	83.3864	
Maximum	0.7011	0.7613	0.5036	9.1000e- 004	0.0193	0.0354	0.0547	3.4700e- 003	0.0327	0.0362	0.0000	82.8619	82.8619	0.0210	0.0000	83.3864	

## **Mitigated Construction**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year					tons	s/yr							MT	/yr		
2019	0.6727	0.8212	0.5286	9.1000e- 004	5.9600e- 003	3.7800e- 003	9.7400e- 003	1.2300e- 003	3.7700e- 003	5.0000e- 003	0.0000	82.8618	82.8618	0.0210	0.0000	83.3863
Maximum	0.6727	0.8212	0.5286	9.1000e- 004	5.9600e- 003	3.7800e- 003	9.7400e- 003	1.2300e- 003	3.7700e- 003	5.0000e- 003	0.0000	82.8618	82.8618	0.0210	0.0000	83.3863

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio-CO2	Total CO2	CH4	N20	CO2e
Percent Reduction	4.05	-7.86	-4.96	0.00	69.14	89.31	82.18	64.55	88.46	86.17	0.00	0.00	0.00	0.00	0.00	0.00

Quarter	Start Date	End Date	Maximum Unmitigated ROG + NOX (tons/quarter)	Maximum Mitigated ROG + NOX (tons/quarter)
1	4-1-2019	6-30-2019	0.4773	0.4935
2	7-1-2019	9-30-2019	0.9427	0.9563
		Highest	0.9427	0.9563

# 3.0 Construction Detail

## **Construction Phase**

Phase	Phase Name	Phase Type	Start Date	End Date	Num Days Num Days	Phase Description
Number					Week	

1	Demolition	Demolition	4/1/2019	4/12/2019	5	10	
2	Site Preparation	Site Preparation	4/13/2019	4/15/2019	5	1	
3	Grading	Grading	4/16/2019	4/17/2019	5	2	
4	Building Construction	Building Construction	4/18/2019	9/4/2019	5	100	
5	Paving	Paving	9/5/2019	9/11/2019	5	5	
6	Architectural Coating	Architectural Coating	9/12/2019	9/18/2019	5	5	

Acres of Grading (Site Preparation Phase): 0.5

Acres of Grading (Grading Phase): 0

Acres of Paving: 0

Residential Indoor: 180,061; Residential Outdoor: 60,020; Non-Residential Indoor: 0; Non-Residential Outdoor: 0; Striped Parking Area:

### OffRoad Equipment

Phase Name	Offroad Equipment Type	Amount	Usage Hours	Horse Power	Load Factor
Architectural Coating	Air Compressors	1	6.00	78	0.48
Building Construction	Cranes	1	4.00	231	0.29
Building Construction	Forklifts	2	6.00	89	0.20
Building Construction	Tractors/Loaders/Backhoes	2	8.00	97	0.37
Demolition	Concrete/Industrial Saws	1	8.00	81	0.73
Demolition	Rubber Tired Dozers	1	1.00	247	0.40
Demolition	Tractors/Loaders/Backhoes	2	6.00	97	0.37
Grading	Concrete/Industrial Saws	1	8.00	81	0.73
Grading	Rubber Tired Dozers	1	1.00	247	0.40
Grading	Tractors/Loaders/Backhoes	2	6.00	97	0.37
Paving	Cement and Mortar Mixers	4	6.00	9	0.56
Paving	Pavers	1	7.00	130	0.42
Paving	Rollers	1	7.00	80	0.38
Paving	Tractors/Loaders/Backhoes	1	7.00	97	0.37
Site Preparation	Graders	1	8.00	187	0.41
Site Preparation	Tractors/Loaders/Backhoes	1	8.00	97	0.37

#### **Trips and VMT**

Phase Name	Offroad Equipment Count	Worker Trip Number	Vendor Trip Number	Hauling Trip Number	Worker Trip Length	Vendor Trip Length	Hauling Trip Length	Worker Vehicle Class	Vendor Vehicle Class	Hauling Vehicle Class
Architectural Coating	1	11.00	0.00	0.00	0.50	0.50	0.50	LD_Mix	HDT_Mix	HHDT
Building Construction	5	57.00	14.00	0.00	0.50	0.50	0.50	LD_Mix	HDT_Mix	HHDT
Demolition	4	10.00	0.00	139.00	0.50	0.50	0.50	LD_Mix	HDT_Mix	HHDT
Grading	4	10.00	0.00	2,660.00	0.50	0.50	0.50	_	HDT_Mix	HHDT
Paving	7	18.00	0.00	0.00	0.50	0.50	0.50	LD_Mix	HDT_Mix	HHDT
Site Preparation	2	5.00	0.00	0.00	0.50	0.50	0.50	LD_Mix	HDT_Mix	HHDT

## **3.1 Mitigation Measures Construction**

Use Cleaner Engines for Construction Equipment
Use DPF for Construction Equipment
Replace Ground Cover
Water Exposed Area

Reduce Vehicle Speed on Unpaved Roads

# 3.2 Demolition - 2019 <u>Unmitigated Construction On-Site</u>

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							МТ	/yr		
Fugitive Dust					0.0150	0.0000	0.0150	2.2700e- 003	0.0000	2.2700e- 003	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	4.7700e- 003	0.0430	0.0385	6.0000e- 005		2.6900e- 003	2.6900e- 003		2.5600e- 003	2.5600e- 003	0.0000	5.2601	5.2601	1.0000e- 003	0.0000	5.2852
Total	4.7700e- 003	0.0430	0.0385	6.0000e- 005	0.0150	2.6900e- 003	0.0177	2.2700e- 003	2.5600e- 003	4.8300e- 003	0.0000	5.2601	5.2601	1.0000e- 003	0.0000	5.2852

### **Unmitigated Construction Off-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							МТ	/yr		
Hauling	1.6000e- 004	7.0700e- 003	1.1600e- 003	1.0000e- 005	3.0000e- 005	1.0000e- 005	4.0000e- 005	1.0000e- 005	1.0000e- 005	2.0000e- 005	0.0000	0.7831	0.7831	1.0000e- 004	0.0000	0.7857
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	6.0000e- 005	2.0000e- 005	3.2000e- 004	0.0000	2.0000e- 005	0.0000	2.0000e- 005	1.0000e- 005	0.0000	1.0000e- 005	0.0000	0.0262	0.0262	0.0000	0.0000	0.0262
Total	2.2000e- 004	7.0900e- 003	1.4800e- 003	1.0000e- 005	5.0000e- 005	1.0000e- 005	6.0000e- 005	2.0000e- 005	1.0000e- 005	3.0000e- 005	0.0000	0.8093	0.8093	1.0000e- 004	0.0000	0.8119

### **Mitigated Construction On-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	/yr		
Fugitive Dust					3.3800e- 003	0.0000	3.3800e- 003	5.1000e- 004	0.0000	5.1000e- 004	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	2.4200e- 003	0.0518	0.0397	6.0000e- 005		3.0000e- 004	3.0000e- 004		3.0000e- 004	3.0000e- 004	0.0000	5.2601	5.2601	1.0000e- 003	0.0000	5.2852
Total	2.4200e- 003	0.0518	0.0397	6.0000e- 005	3.3800e- 003	3.0000e- 004	3.6800e- 003	5.1000e- 004	3.0000e- 004	8.1000e- 004	0.0000	5.2601	5.2601	1.0000e- 003	0.0000	5.2852

## **Mitigated Construction Off-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							МТ	/yr		
Hauling	1.6000e- 004	7.0700e- 003	1.1600e- 003	1.0000e- 005	3.0000e- 005	1.0000e- 005	4.0000e- 005	1.0000e- 005	1.0000e- 005	2.0000e- 005	0.0000	0.7831	0.7831	1.0000e- 004	0.0000	0.7857
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	6.0000e- 005	2.0000e- 005	3.2000e- 004	0.0000	2.0000e- 005	0.0000	2.0000e- 005	1.0000e- 005	0.0000	1.0000e- 005	0.0000	0.0262	0.0262	0.0000	0.0000	0.0262
Total	2.2000e- 004	7.0900e- 003	1.4800e- 003	1.0000e- 005	5.0000e- 005	1.0000e- 005	6.0000e- 005	2.0000e- 005	1.0000e- 005	3.0000e- 005	0.0000	0.8093	0.8093	1.0000e- 004	0.0000	0.8119

## 3.3 Site Preparation - 2019

# **Unmitigated Construction On-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	/yr		
Fugitive Dust					2.7000e- 004	0.0000	2.7000e- 004	3.0000e- 005	0.0000	3.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	3.6000e- 004	4.4600e- 003	2.0700e- 003	0.0000		1.8000e- 004	1.8000e- 004		1.7000e- 004	1.7000e- 004	0.0000	0.4378	0.4378	1.4000e- 004	0.0000	0.4413
Total	3.6000e- 004	4.4600e- 003	2.0700e- 003	0.0000	2.7000e- 004	1.8000e- 004	4.5000e- 004	3.0000e- 005	1.7000e- 004	2.0000e- 004	0.0000	0.4378	0.4378	1.4000e- 004	0.0000	0.4413

## **Unmitigated Construction Off-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	/yr		
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000

Vend	or	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
)		<u></u>		<u></u>								,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,		,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,			
Work	er	0.0000	0.0000	2.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	1.3100e- 003	1.3100e- 003	0.0000	0.0000	1.3100e- 003
				003									003	003			003
Tota	al	0.0000	0.0000	2.0000e-	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	1.3100e-	1.3100e-	0.0000	0.0000	1.3100e-
				005									003	003			003

#### **Mitigated Construction On-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							МТ	/yr		
Fugitive Dust					6.0000e- 005	0.0000	6.0000e- 005	1.0000e- 005	0.0000	1.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	1.5000e- 004	4.3100e- 003	2.9300e- 003	0.0000		2.0000e- 005	2.0000e- 005		2.0000e- 005	2.0000e- 005	0.0000	0.4378	0.4378	1.4000e- 004	0.0000	0.4413
Total	1.5000e- 004	4.3100e- 003	2.9300e- 003	0.0000	6.0000e- 005	2.0000e- 005	8.0000e- 005	1.0000e- 005	2.0000e- 005	3.0000e- 005	0.0000	0.4378	0.4378	1.4000e- 004	0.0000	0.4413

#### **Mitigated Construction Off-Site**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	/yr		
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	0.0000	0.0000	2.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	1.3100e- 003	1.3100e- 003	0.0000	0.0000	1.3100e- 003
Total	0.0000	0.0000	2.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	1.3100e- 003	1.3100e- 003	0.0000	0.0000	1.3100e- 003

# 3.4 Grading - 2019

# **Unmitigated Construction On-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							МТ	-/yr		
Fugitive Dust					1.9600e- 003	0.0000	1.9600e- 003	6.0000e- 004	0.0000	6.0000e- 004	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	9.5000e- 004	8.6000e- 003	7.6900e- 003	1.0000e- 005		5.4000e- 004	5.4000e- 004		5.1000e- 004	5.1000e- 004	0.0000	1.0520	1.0520	2.0000e- 004	0.0000	1.0570
Total	9.5000e- 004	8.6000e- 003	7.6900e- 003	1.0000e- 005	1.9600e- 003	5.4000e- 004	2.5000e- 003	6.0000e- 004	5.1000e- 004	1.1100e- 003	0.0000	1.0520	1.0520	2.0000e- 004	0.0000	1.0570

#### **Unmitigated Construction Off-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr				MT	/yr					
Hauling	3.0000e- 003	0.1353	0.0223	1.6000e- 004	5.9000e- 004	1.4000e- 004	7.3000e- 004	1.6000e- 004	1.4000e- 004	3.0000e- 004	0.0000	14.9867	14.9867	1.9400e- 003	0.0000	15.0351
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	1.0000e- 005	0.0000	6.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	5.2300e- 003	5.2300e- 003	0.0000	0.0000	5.2400e- 003
Total	3.0100e- 003	0.1353	0.0223	1.6000e- 004	5.9000e- 004	1.4000e- 004	7.3000e- 004	1.6000e- 004	1.4000e- 004	3.0000e- 004	0.0000	14.9919	14.9919	1.9400e- 003	0.0000	15.0404

#### **Mitigated Construction On-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							МТ	/yr		
Fugitive Dust					4.4000e- 004	0.0000	4.4000e- 004	1.3000e- 004	0.0000	1.3000e- 004	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	4.8000e- 004	0.0104	7.9400e- 003	1.0000e- 005		6.0000e- 005	6.0000e- 005		6.0000e- 005	6.0000e- 005	0.0000	1.0520	1.0520	2.0000e- 004	0.0000	1.0570
Total	4.8000e- 004	0.0104	7.9400e- 003	1.0000e- 005	4.4000e- 004	6.0000e- 005	5.0000e- 004	1.3000e- 004	6.0000e- 005	1.9000e- 004	0.0000	1.0520	1.0520	2.0000e- 004	0.0000	1.0570

#### **Mitigated Construction Off-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	/yr		
Hauling	3.0000e- 003	0.1353	0.0223	1.6000e- 004	5.9000e- 004	1.4000e- 004	7.3000e- 004	1.6000e- 004	1.4000e- 004	3.0000e- 004	0.0000	14.9867	14.9867	1.9400e- 003	0.0000	15.0351
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	1.0000e- 005	0.0000	6.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	5.2300e- 003	5.2300e- 003	0.0000	0.0000	5.2400e- 003
Total	3.0100e- 003	0.1353	0.0223	1.6000e- 004	5.9000e- 004	1.4000e- 004	7.3000e- 004	1.6000e- 004	1.4000e- 004	3.0000e- 004	0.0000	14.9919	14.9919	1.9400e- 003	0.0000	15.0404

# 3.5 Building Construction - 2019 <u>Unmitigated Construction On-Site</u>

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	/yr		
Off-Road	0.0479	0.4910	0.3772	5.7000e- 004		0.0303	0.0303		0.0279	0.0279	0.0000	51.1502	51.1502	0.0162	0.0000	51.5548

Total	0.0479	0.4910	0.3772	5.7000e-	0.0303	0.0303	0.0279	0.0279	0.0000	51.1502	51.1502	0.0162	0.0000	51.5548
				004										

#### **Unmitigated Construction Off-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons				МТ	/yr						
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	1.3700e- 003	0.0462	0.0134	5.0000e- 005	3.3000e- 004	8.0000e- 005	4.1000e- 004	1.0000e- 004	8.0000e- 005	1.7000e- 004	0.0000	4.5981	4.5981	5.8000e- 004	0.0000	4.6125
Worker	3.1500e- 003	1.3500e- 003	0.0181	2.0000e- 005	1.0700e- 003	2.0000e- 005	1.1000e- 003	2.9000e- 004	2.0000e- 005	3.1000e- 004	0.0000	1.4917	1.4917	9.0000e- 005	0.0000	1.4941
Total	4.5200e- 003	0.0475	0.0315	7.0000e- 005	1.4000e- 003	1.0000e- 004	1.5100e- 003	3.9000e- 004	1.0000e- 004	4.8000e- 004	0.0000	6.0898	6.0898	6.7000e- 004	0.0000	6.1066

#### **Mitigated Construction On-Site**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	/yr		
Off-Road	0.0235	0.5351	0.3981	5.7000e- 004		2.8900e- 003	2.8900e- 003		2.8900e- 003	2.8900e- 003	0.0000	51.1502	51.1502	0.0162	0.0000	51.5548
Total	0.0235	0.5351	0.3981	5.7000e- 004		2.8900e- 003	2.8900e- 003		2.8900e- 003	2.8900e- 003	0.0000	51.1502	51.1502	0.0162	0.0000	51.5548

#### **Mitigated Construction Off-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr				МТ	/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	1.3700e- 003	0.0462	0.0134	5.0000e- 005	3.3000e- 004	8.0000e- 005	4.1000e- 004	1.0000e- 004	8.0000e- 005	1.7000e- 004	0.0000	4.5981	4.5981	5.8000e- 004	0.0000	4.6125
Worker	3.1500e- 003	1.3500e- 003	0.0181	2.0000e- 005	1.0700e- 003	2.0000e- 005	1.1000e- 003	2.9000e- 004	2.0000e- 005	3.1000e- 004	0.0000	1.4917	1.4917	9.0000e- 005	0.0000	1.4941
Total	4.5200e- 003	0.0475	0.0315	7.0000e- 005	1.4000e- 003	1.0000e- 004	1.5100e- 003	3.9000e- 004	1.0000e- 004	4.8000e- 004	0.0000	6.0898	6.0898	6.7000e- 004	0.0000	6.1066

# 3.6 Paving - 2019

#### **Unmitigated Construction On-Site**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							МТ	√yr		
Off-Road	2.0700e- 003	0.0196	0.0179	3.0000e- 005		1.1100e- 003	1.1100e- 003		1.0300e- 003	1.0300e- 003	0.0000	2.3931	2.3931	6.8000e- 004	0.0000	2.4102
Paving	0.0000					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total	2.0700e- 003	0.0196	0.0179	3.0000e- 005		1.1100e- 003	1.1100e- 003		1.0300e- 003	1.0300e- 003	0.0000	2.3931	2.3931	6.8000e- 004	0.0000	2.4102

#### **Unmitigated Construction Off-Site**

ROG	NOx	CO	SO2	Fugitive	Exhaust	PM10	Fugitive	Exhaust	_	Bio- CO2	NBio-	Total CO2	CH4	N2O	CO2e
				PM10	PM10	Total	PM2.5	PM2.5	Total		CO2				

Category					tons	s/yr							МТ	-/yr		
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	5.0000e- 005	2.0000e- 005	2.9000e- 004	0.0000	2.0000e- 005	0.0000	2.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0236	0.0236	0.0000	0.0000	0.0236
Total	5.0000e- 005	2.0000e- 005	2.9000e- 004	0.0000	2.0000e- 005	0.0000	2.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0236	0.0236	0.0000	0.0000	0.0236

#### **Mitigated Construction On-Site**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	/yr		
Off-Road	1.4300e- 003	0.0237	0.0196	3.0000e- 005		2.2000e- 004	2.2000e- 004		2.2000e- 004	2.2000e- 004	0.0000	2.3931	2.3931	6.8000e- 004	0.0000	2.4102
Paving	0.0000					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total	1.4300e- 003	0.0237	0.0196	3.0000e- 005		2.2000e- 004	2.2000e- 004		2.2000e- 004	2.2000e- 004	0.0000	2.3931	2.3931	6.8000e- 004	0.0000	2.4102

#### **Mitigated Construction Off-Site**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	/yr		
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000

Worker	5.0000e- 005	2.0000e- 005	2.9000e- 004	0.0000	2.0000e- 005	0.0000	2.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0236	0.0236	0.0000	0.0000	0.0236
Total	5.0000e- 005	2.0000e- 005	2.9000e- 004	0.0000	2.0000e- 005	0.0000	2.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0236	0.0236	0.0000	0.0000	0.0236

# 3.7 Architectural Coating - 2019 <u>Unmitigated Construction On-Site</u>

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							МТ	/yr		
Archit. Coating	0.6365					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	6.7000e- 004	4.5900e- 003	4.6000e- 003	1.0000e- 005		3.2000e- 004	3.2000e- 004		3.2000e- 004	3.2000e- 004	0.0000	0.6383	0.6383	5.0000e- 005	0.0000	0.6397
Total	0.6372	4.5900e- 003	4.6000e- 003	1.0000e- 005		3.2000e- 004	3.2000e- 004		3.2000e- 004	3.2000e- 004	0.0000	0.6383	0.6383	5.0000e- 005	0.0000	0.6397

#### **Unmitigated Construction Off-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	:/yr							MT	/yr		
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	3.0000e- 005	1.0000e- 005	1.7000e- 004	0.0000	1.0000e- 005	0.0000	1.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0144	0.0144	0.0000	0.0000	0.0144
Total	3.0000e- 005	1.0000e- 005	1.7000e- 004	0.0000	1.0000e- 005	0.0000	1.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0144	0.0144	0.0000	0.0000	0.0144

#### **Mitigated Construction On-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							МТ	/yr		
Archit. Coating	0.6365					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	2.8000e- 004	5.8800e- 003	4.5800e- 003	1.0000e- 005		4.0000e- 005	4.0000e- 005		4.0000e- 005	4.0000e- 005	0.0000	0.6383	0.6383	5.0000e- 005	0.0000	0.6397
Total	0.6368	5.8800e- 003	4.5800e- 003	1.0000e- 005		4.0000e- 005	4.0000e- 005		4.0000e- 005	4.0000e- 005	0.0000	0.6383	0.6383	5.0000e- 005	0.0000	0.6397

# **Mitigated Construction Off-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	/yr		
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	3.0000e- 005	1.0000e- 005	1.7000e- 004	0.0000	1.0000e- 005	0.0000	1.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0144	0.0144	0.0000	0.0000	0.0144
Total	3.0000e- 005	1.0000e- 005	1.7000e- 004	0.0000	1.0000e- 005	0.0000	1.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0144	0.0144	0.0000	0.0000	0.0144

CalEEMod Version: CalEEMod.2016.3.2

Page 1 of 1

Date: 3/6/2018 2:05 PM

4846/4856 ECR Construction TAC - Santa Clara County, Annual

# 4846/4856 ECR Construction TAC, Tier 4 Santa Clara County, Annual

#### 1.0 Project Characteristics

#### 1.1 Land Usage

Land Uses	Size	Metric	Lot Acreage	Floor Surface Area	Population
Enclosed Parking Structure	112.00	Space	0.00	50,856.00	0
Condo/Townhouse	50.00	Dwelling Unit	0.73	88,919.00	143

#### 1.2 Other Project Characteristics

Urbanization	Urban	Wind Speed (m/s)	2.2	Precipitation Freq (Days)	58
Climate Zone	4			Operational Year	2020
Utility Company	Pacific Gas & Ele	ctric Company			
CO2 Intensity (lb/MWhr)	641.35	CH4 Intensity (lb/MWhr)	0.029	N2O Intensity 0 (Ib/MWhr)	.006

#### 1.3 User Entered Comments & Non-Default Data

Project Characteristics -

Land Use - from "\_\_18-03-05 Mohr Clock DRB\_Lores.pdf" plan set

Construction Phase - Construction start date April 2019, default phase durations for a project of this type and size

Trips and VMT - 0.5mi trip lengths for TAC

Demolition - 10,000sf bldg demo, 20,500sf hardscape

Grading - 21,280 cy export

Construction Off-road Equipment Mitigation - Tier 4 engines for equip >25 hp. BAAQMD BMPs.

Table Name	Column Name	Default Value	New Value
tblConstDustMitigation	WaterUnpavedRoadVehicleSpeed	0	15
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	1.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	2.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	1.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	2.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	1.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	1.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	1.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	2.00
tblConstEquipMitigation	NumberOfEquipmentMitigated	0.00	8.00
tblConstEquipMitigation	Tier	No Change	Tier 4 Interim
tblConstEquipMitigation	Tier	No Change	Tier 4 Interim
tblConstEquipMitigation	Tier	No Change	Tier 4 Interim
tblConstEquipMitigation	Tier	No Change	Tier 4 Interim
tblConstEquipMitigation	Tier	No Change	Tier 4 Interim
tblConstEquipMitigation	Tier	No Change	Tier 4 Interim
tblConstEquipMitigation	Tier	No Change	Tier 4 Interim
tblConstEquipMitigation	Tier	No Change	Tier 4 Interim
tblConstEquipMitigation	Tier	No Change	Tier 4 Interim
tblGrading	MaterialExported	0.00	21,280.00
tblLandUse	LandUseSquareFeet	44,800.00	50,856.00
tblLandUse	LandUseSquareFeet	50,000.00	88,919.00
tblLandUse	LotAcreage	1.01	0.00
tblLandUse	LotAcreage	3.13	0.73
tblTripsAndVMT	HaulingTripLength	20.00	0.50
tblTripsAndVMT	HaulingTripLength	20.00	0.50
tblTripsAndVMT	HaulingTripLength	20.00	0.50
tblTripsAndVMT	HaulingTripLength	20.00	0.50
tblTripsAndVMT	HaulingTripLength	20.00	0.50

tblTripsAndVMT	HaulingTripLength	20.00	0.50
tblTripsAndVMT	VendorTripLength	7.30	0.50
tblTripsAndVMT	VendorTripLength	7.30	0.50
tblTripsAndVMT	VendorTripLength	7.30	0.50
tblTripsAndVMT	VendorTripLength	7.30	0.50
tblTripsAndVMT	VendorTripLength	7.30	0.50
tblTripsAndVMT	VendorTripLength	7.30	0.50
tblTripsAndVMT	WorkerTripLength	10.80	0.50
tblTripsAndVMT	WorkerTripLength	10.80	0.50
tblTripsAndVMT	WorkerTripLength	10.80	0.50
tblTripsAndVMT	WorkerTripLength	10.80	0.50
tblTripsAndVMT	WorkerTripLength	10.80	0.50
tblTripsAndVMT	WorkerTripLength	10.80	0.50

# 2.0 Emissions Summary

# 2.1 Overall Construction <a href="Unmitigated Construction">Unmitigated Construction</a>

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year					tons	s/yr							MT	/yr		
2019	0.7011	0.7613	0.5036	9.1000e- 004	0.0193	0.0354	0.0547	3.4700e- 003	0.0327	0.0362	0.0000	82.8619	82.8619	0.0210	0.0000	83.3864
Maximum	0.7011	0.7613	0.5036	9.1000e- 004	0.0193	0.0354	0.0547	3.4700e- 003	0.0327	0.0362	0.0000	82.8619	82.8619	0.0210	0.0000	83.3864

#### **Mitigated Construction**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year					tons	s/yr							MT	/yr		
2019	0.6588	0.4582	0.5286	9.1000e- 004	5.9600e- 003	1.4600e- 003	7.4100e- 003	1.2300e- 003	1.4400e- 003	2.6700e- 003	0.0000	82.8618	82.8618	0.0210	0.0000	83.3863
Maximum	0.6588	0.4582	0.5286	9.1000e- 004	5.9600e- 003	1.4600e- 003	7.4100e- 003	1.2300e- 003	1.4400e- 003	2.6700e- 003	0.0000	82.8618	82.8618	0.0210	0.0000	83.3863

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio-CO2	Total CO2	CH4	N20	CO2e
Percent Reduction	6.03	39.82	-4.96	0.00	69.14	95.87	86.45	64.55	95.59	92.61	0.00	0.00	0.00	0.00	0.00	0.00

Quarter	Start Date	End Date	Maximum Unmitigated ROG + NOX (tons/quarter)	Maximum Mitigated ROG + NOX (tons/quarter)
1	4-1-2019	6-30-2019	0.4773	0.2865
2	7-1-2019	9-30-2019	0.9427	0.7892
		Highest	0.9427	0.7892

# 3.0 Construction Detail

#### **Construction Phase**

Phase Number	Phase Name	Phase Type	Start Date	End Date	Num Days Week	Num Days	Phase Description
1	Demolition	Demolition	4/1/2019	4/12/2019	5	10	
2	Site Preparation	Site Preparation	4/13/2019	4/15/2019	5	1	
3	Grading	Grading	4/16/2019	4/17/2019	5	2	
4	Building Construction	Building Construction	4/18/2019	9/4/2019	5	100	
5	Paving	Paving	9/5/2019	9/11/2019	5	5	
6	Architectural Coating	Architectural Coating	9/12/2019	9/18/2019	5	5	

Acres of Grading (Site Preparation Phase): 0.5

#### Acres of Grading (Grading Phase): 0

Acres of Paving: 0

Residential Indoor: 180,061; Residential Outdoor: 60,020; Non-Residential Indoor: 0; Non-Residential Outdoor: 0; Striped Parking Area:

#### OffRoad Equipment

Phase Name	Offroad Equipment Type	Amount	Usage Hours	Horse Power	Load Factor
Architectural Coating	Air Compressors	1	6.00	78	0.48
Building Construction	Cranes	1	4.00	231	0.29
Building Construction	Forklifts	2	6.00	89	0.20
Building Construction	Tractors/Loaders/Backhoes	2	8.00	97	0.37
Demolition	Concrete/Industrial Saws	1	8.00	81	0.73
Demolition	Rubber Tired Dozers	1	1.00	247	0.40
Demolition	Tractors/Loaders/Backhoes	2	6.00	97	0.37
Grading	Concrete/Industrial Saws	1	8.00	81	0.73
Grading	Rubber Tired Dozers	1	1.00	247	0.40
Grading	Tractors/Loaders/Backhoes	2	6.00	97	0.37
Paving	Cement and Mortar Mixers	4	6.00	9	0.56
Paving	Pavers	1	7.00	130	0.42
Paving	Rollers	1	7.00	80	0.38
Paving	Tractors/Loaders/Backhoes	1	7.00	97	0.37
Site Preparation	Graders	1	8.00	187	0.41
Site Preparation	Tractors/Loaders/Backhoes	1	8.00	97	0.37

#### **Trips and VMT**

Phase Name	Offroad Equipment Count	Worker Trip Number	Vendor Trip Number	Hauling Trip Number	Worker Trip Length	Vendor Trip Length	Hauling Trip Length	Worker Vehicle Class	Vendor Vehicle Class	Hauling Vehicle Class
Architectural Coating	1	11.00	0.00	0.00	0.50	0.50	0.50	LD_Mix	HDT_Mix	HHDT
Building Construction	5	57.00	14.00	0.00	0.50	0.50	0.50	LD_Mix	HDT_Mix	HHDT
Demolition	4	10.00	0.00	139.00	0.50	0.50	0.50	LD_Mix	HDT_Mix	HHDT
Grading	4	10.00	0.00	2,660.00	0.50	0.50	0.50	LD_Mix	HDT_Mix	HHDT

Paving	7	18.00	0.00	0.00	0.50	0.50	0.50 LD_Mix	HDT_Mix	HHDT
Site Preparation	2	5.00	0.00	0.00	0.50	0.50	0.50 LD_Mix	HDT_Mix	HHDT

# **3.1 Mitigation Measures Construction**

Use Cleaner Engines for Construction Equipment

Replace Ground Cover

Water Exposed Area

Reduce Vehicle Speed on Unpaved Roads

#### 3.2 Demolition - 2019

#### **Unmitigated Construction On-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							МТ	/yr		
Fugitive Dust					0.0150	0.0000	0.0150	2.2700e- 003	0.0000	2.2700e- 003	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	4.7700e- 003	0.0430	0.0385	6.0000e- 005		2.6900e- 003	2.6900e- 003		2.5600e- 003	2.5600e- 003	0.0000	5.2601	5.2601	1.0000e- 003	0.0000	5.2852
Total	4.7700e- 003	0.0430	0.0385	6.0000e- 005	0.0150	2.6900e- 003	0.0177	2.2700e- 003	2.5600e- 003	4.8300e- 003	0.0000	5.2601	5.2601	1.0000e- 003	0.0000	5.2852

#### **Unmitigated Construction Off-Site**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							МТ	/yr		
Hauling	1.6000e- 004	7.0700e- 003	1.1600e- 003	1.0000e- 005	3.0000e- 005	1.0000e- 005	4.0000e- 005	1.0000e- 005	1.0000e- 005	2.0000e- 005	0.0000	0.7831	0.7831	1.0000e- 004	0.0000	0.7857

Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	6.0000e-	2.0000e-	3.2000e-	0.0000	2.0000e-	0.0000	2.0000e-	1.0000e-	0.0000	1.0000e-	0.0000	0.0262	0.0262	0.0000	0.0000	0.0262
	005	005	004		005		005	005		005						
Total	2.2000e-	7.0900e-	1.4800e-	1.0000e-	5.0000e-	1.0000e-	6.0000e-	2.0000e-	1.0000e-	3.0000e-	0.0000	0.8093	0.8093	1.0000e-	0.0000	0.8119
	004	003	003	005	005	005	005	005	005	005				004		

# **Mitigated Construction On-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	/yr		
Fugitive Dust					3.3800e- 003	0.0000	3.3800e- 003	5.1000e- 004	0.0000	5.1000e- 004	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	1.1800e- 003	0.0227	0.0397	6.0000e- 005		9.0000e- 005	9.0000e- 005		9.0000e- 005	9.0000e- 005	0.0000	5.2601	5.2601	1.0000e- 003	0.0000	5.2852
Total	1.1800e- 003	0.0227	0.0397	6.0000e- 005	3.3800e- 003	9.0000e- 005	3.4700e- 003	5.1000e- 004	9.0000e- 005	6.0000e- 004	0.0000	5.2601	5.2601	1.0000e- 003	0.0000	5.2852

#### **Mitigated Construction Off-Site**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	/yr		
Hauling	1.6000e- 004	7.0700e- 003	1.1600e- 003	1.0000e- 005	3.0000e- 005	1.0000e- 005	4.0000e- 005	1.0000e- 005	1.0000e- 005	2.0000e- 005	0.0000	0.7831	0.7831	1.0000e- 004	0.0000	0.7857
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	6.0000e- 005	2.0000e- 005	3.2000e- 004	0.0000	2.0000e- 005	0.0000	2.0000e- 005	1.0000e- 005	0.0000	1.0000e- 005	0.0000	0.0262	0.0262	0.0000	0.0000	0.0262
Total	2.2000e- 004	7.0900e- 003	1.4800e- 003	1.0000e- 005	5.0000e- 005	1.0000e- 005	6.0000e- 005	2.0000e- 005	1.0000e- 005	3.0000e- 005	0.0000	0.8093	0.8093	1.0000e- 004	0.0000	0.8119

# 3.3 Site Preparation - 2019

#### **Unmitigated Construction On-Site**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							МТ	/yr		
Fugitive Dust					2.7000e- 004	0.0000	2.7000e- 004	3.0000e- 005	0.0000	3.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	3.6000e- 004	4.4600e- 003	2.0700e- 003	0.0000		1.8000e- 004	1.8000e- 004		1.7000e- 004	1.7000e- 004	0.0000	0.4378	0.4378	1.4000e- 004	0.0000	0.4413
Total	3.6000e- 004	4.4600e- 003	2.0700e- 003	0.0000	2.7000e- 004	1.8000e- 004	4.5000e- 004	3.0000e- 005	1.7000e- 004	2.0000e- 004	0.0000	0.4378	0.4378	1.4000e- 004	0.0000	0.4413

#### **Unmitigated Construction Off-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	/yr		
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	0.0000	0.0000	2.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	1.3100e- 003	1.3100e- 003	0.0000	0.0000	1.3100e- 003
Total	0.0000	0.0000	2.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	1.3100e- 003	1.3100e- 003	0.0000	0.0000	1.3100e- 003

#### **Mitigated Construction On-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							МТ	/yr		
Fugitive Dust					6.0000e- 005	0.0000	6.0000e- 005	1.0000e- 005	0.0000	1.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	9.0000e- 005	1.5500e- 003	2.9300e- 003	0.0000		1.0000e- 005	1.0000e- 005		1.0000e- 005	1.0000e- 005	0.0000	0.4378	0.4378	1.4000e- 004	0.0000	0.4413
Total	9.0000e- 005	1.5500e- 003	2.9300e- 003	0.0000	6.0000e- 005	1.0000e- 005	7.0000e- 005	1.0000e- 005	1.0000e- 005	2.0000e- 005	0.0000	0.4378	0.4378	1.4000e- 004	0.0000	0.4413

#### **Mitigated Construction Off-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	/yr		
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	0.0000	0.0000	2.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	1.3100e- 003	1.3100e- 003	0.0000	0.0000	1.3100e- 003
Total	0.0000	0.0000	2.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	1.3100e- 003	1.3100e- 003	0.0000	0.0000	1.3100e- 003

# 3.4 Grading - 2019

# **Unmitigated Construction On-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	/yr		
Fugitive Dust					1.9600e- 003	0.0000	1.9600e- 003	6.0000e- 004	0.0000	6.0000e- 004	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000

Off-Road	9.5000e-	8.6000e-	7.6900e-	1.0000e-		5.4000e-	5.4000e-		5.1000e-	5.1000e-	0.0000	1.0520	1.0520	2.0000e-	0.0000	1.0570
	004	003	003	005		004	004		004	004				004		
Total	9.5000e-	8.6000e-	7.6900e-	1.0000e-	1.9600e-	5.4000e-	2.5000e-	6.0000e-	5.1000e-	1.1100e-	0.0000	1.0520	1.0520	2.0000e-	0.0000	1.0570
	004	003	003	005	003	004	003	004	004	003	0.0000			004	0.000	

# **Unmitigated Construction Off-Site**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	/yr		
Hauling	3.0000e- 003	0.1353	0.0223	1.6000e- 004	5.9000e- 004	1.4000e- 004	7.3000e- 004	1.6000e- 004	1.4000e- 004	3.0000e- 004	0.0000	14.9867	14.9867	1.9400e- 003	0.0000	15.0351
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	1.0000e- 005	0.0000	6.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	5.2300e- 003	5.2300e- 003	0.0000	0.0000	5.2400e- 003
Total	3.0100e- 003	0.1353	0.0223	1.6000e- 004	5.9000e- 004	1.4000e- 004	7.3000e- 004	1.6000e- 004	1.4000e- 004	3.0000e- 004	0.0000	14.9919	14.9919	1.9400e- 003	0.0000	15.0404

#### **Mitigated Construction On-Site**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	-/yr		
Fugitive Dust					4.4000e- 004	0.0000	4.4000e- 004	1.3000e- 004	0.0000	1.3000e- 004	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	2.4000e- 004	4.5400e- 003	7.9400e- 003	1.0000e- 005	D	2.0000e- 005	2.0000e- 005		2.0000e- 005	2.0000e- 005	0.0000	1.0520	1.0520	2.0000e- 004	0.0000	1.0570
Total	2.4000e- 004	4.5400e- 003	7.9400e- 003	1.0000e- 005	4.4000e- 004	2.0000e- 005	4.6000e- 004	1.3000e- 004	2.0000e- 005	1.5000e- 004	0.0000	1.0520	1.0520	2.0000e- 004	0.0000	1.0570

#### **Mitigated Construction Off-Site**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							МТ	-/yr		
Hauling	3.0000e- 003	0.1353	0.0223	1.6000e- 004	5.9000e- 004	1.4000e- 004	7.3000e- 004	1.6000e- 004	1.4000e- 004	3.0000e- 004	0.0000	14.9867	14.9867	1.9400e- 003	0.0000	15.0351
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	1.0000e- 005	0.0000	6.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	5.2300e- 003	5.2300e- 003	0.0000	0.0000	5.2400e- 003
Total	3.0100e- 003	0.1353	0.0223	1.6000e- 004	5.9000e- 004	1.4000e- 004	7.3000e- 004	1.6000e- 004	1.4000e- 004	3.0000e- 004	0.0000	14.9919	14.9919	1.9400e- 003	0.0000	15.0404

# 3.5 Building Construction - 2019

**Unmitigated Construction On-Site** 

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	/yr		
Off-Road	0.0479	0.4910	0.3772	5.7000e- 004		0.0303	0.0303		0.0279	0.0279	0.0000	51.1502	51.1502	0.0162	0.0000	51.5548
Total	0.0479	0.4910	0.3772	5.7000e- 004		0.0303	0.0303		0.0279	0.0279	0.0000	51.1502	51.1502	0.0162	0.0000	51.5548

# **Unmitigated Construction Off-Site**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e

Category					tons	s/yr							MT	/yr		
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	1.3700e- 003	0.0462	0.0134	5.0000e- 005	3.3000e- 004	8.0000e- 005	4.1000e- 004	1.0000e- 004	8.0000e- 005	1.7000e- 004	0.0000	4.5981	4.5981	5.8000e- 004	0.0000	4.6125
Worker	3.1500e- 003	1.3500e- 003	0.0181	2.0000e- 005	1.0700e- 003	2.0000e- 005	1.1000e- 003	2.9000e- 004	2.0000e- 005	3.1000e- 004	0.0000	1.4917	1.4917	9.0000e- 005	0.0000	1.4941
Total	4.5200e- 003	0.0475	0.0315	7.0000e- 005	1.4000e- 003	1.0000e- 004	1.5100e- 003	3.9000e- 004	1.0000e- 004	4.8000e- 004	0.0000	6.0898	6.0898	6.7000e- 004	0.0000	6.1066

#### **Mitigated Construction On-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	i/yr							MT	/yr		
Off-Road	0.0119	0.2240	0.3981	5.7000e- 004		9.3000e- 004	9.3000e- 004		9.3000e- 004	9.3000e- 004	0.0000	51.1502	51.1502	0.0162	0.0000	51.5548
Total	0.0119	0.2240	0.3981	5.7000e- 004		9.3000e- 004	9.3000e- 004		9.3000e- 004	9.3000e- 004	0.0000	51.1502	51.1502	0.0162	0.0000	51.5548

#### **Mitigated Construction Off-Site**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	/yr		
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	1.3700e- 003	0.0462	0.0134	5.0000e- 005	3.3000e- 004	8.0000e- 005	4.1000e- 004	1.0000e- 004	8.0000e- 005	1.7000e- 004	0.0000	4.5981	4.5981	5.8000e- 004	0.0000	4.6125

Worker	3.1500e- 003	1.3500e- 003	0.0181	2.0000e- 005	1.0700e- 003	2.0000e- 005	1.1000e- 003	2.9000e- 004	2.0000e- 005	3.1000e- 004	0.0000	1.4917	1.4917	9.0000e- 005	0.0000	1.4941
Total	4.5200e- 003	0.0475	0.0315	7.0000e- 005	1.4000e- 003	1.0000e- 004	1.5100e- 003	3.9000e- 004	1.0000e- 004	4.8000e- 004	0.0000	6.0898	6.0898	6.7000e- 004	0.0000	6.1066

# 3.6 Paving - 2019

#### **Unmitigated Construction On-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							МТ	/yr		
Off-Road	2.0700e- 003	0.0196	0.0179	3.0000e- 005		1.1100e- 003	1.1100e- 003		1.0300e- 003	1.0300e- 003	0.0000	2.3931	2.3931	6.8000e- 004	0.0000	2.4102
Paving	0.0000					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total	2.0700e- 003	0.0196	0.0179	3.0000e- 005		1.1100e- 003	1.1100e- 003		1.0300e- 003	1.0300e- 003	0.0000	2.3931	2.3931	6.8000e- 004	0.0000	2.4102

#### **Unmitigated Construction Off-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	/yr		
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	5.0000e- 005	2.0000e- 005	2.9000e- 004	0.0000	2.0000e- 005	0.0000	2.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0236	0.0236	0.0000	0.0000	0.0236
Total	5.0000e- 005	2.0000e- 005	2.9000e- 004	0.0000	2.0000e- 005	0.0000	2.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0236	0.0236	0.0000	0.0000	0.0236

#### **Mitigated Construction On-Site**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							МТ	-/yr		
Off-Road	8.5000e- 004	0.0128	0.0196	3.0000e- 005		1.5000e- 004	1.5000e- 004		1.5000e- 004	1.5000e- 004	0.0000	2.3931	2.3931	6.8000e- 004	0.0000	2.4102
Paving	0.0000					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total	8.5000e- 004	0.0128	0.0196	3.0000e- 005		1.5000e- 004	1.5000e- 004		1.5000e- 004	1.5000e- 004	0.0000	2.3931	2.3931	6.8000e- 004	0.0000	2.4102

#### **Mitigated Construction Off-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	/yr		
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	5.0000e- 005	2.0000e- 005	2.9000e- 004	0.0000	2.0000e- 005	0.0000	2.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0236	0.0236	0.0000	0.0000	0.0236
Total	5.0000e- 005	2.0000e- 005	2.9000e- 004	0.0000	2.0000e- 005	0.0000	2.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0236	0.0236	0.0000	0.0000	0.0236

# 3.7 Architectural Coating - 2019

**Unmitigated Construction On-Site** 

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
--	-----	-----	----	-----	------------------	-----------------	---------------	-------------------	------------------	----------------	----------	--------------	-----------	-----	-----	------

Category					tons	s/yr						MT	/yr		
Archit. Coating	0.6365					0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	6.7000e- 004	4.5900e- 003	4.6000e- 003	1.0000e- 005		3.2000e- 004	3.2000e- 004	3.2000e- 004	3.2000e- 004	0.0000	0.6383	0.6383	5.0000e- 005	0.0000	0.6397
Total	0.6372	4.5900e- 003	4.6000e- 003	1.0000e- 005		3.2000e- 004	3.2000e- 004	3.2000e- 004	3.2000e- 004	0.0000	0.6383	0.6383	5.0000e- 005	0.0000	0.6397

#### **Unmitigated Construction Off-Site**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							МТ	/yr		
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	3.0000e- 005	1.0000e- 005	1.7000e- 004	0.0000	1.0000e- 005	0.0000	1.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0144	0.0144	0.0000	0.0000	0.0144
Total	3.0000e- 005	1.0000e- 005	1.7000e- 004	0.0000	1.0000e- 005	0.0000	1.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0144	0.0144	0.0000	0.0000	0.0144

#### **Mitigated Construction On-Site**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	/yr		
Archit. Coating	0.6365					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Off-Road	1.4000e- 004	2.6500e- 003	4.5800e- 003	1.0000e- 005		1.0000e- 005	1.0000e- 005		1.0000e- 005	1.0000e- 005	0.0000	0.6383	0.6383	5.0000e- 005	0.0000	0.6397

Total	0.6367	2.6500e-	4.5800e-	1.0000e-	1.0000e-	1.0000e-	1.0000e-	1.0000e-	0.0000	0.6383	0.6383	5.0000e-	0.0000	0.6397
		003	003	005	005	005	005	005				005		

#### **Mitigated Construction Off-Site**

	ROG	NOx	СО	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category					tons	s/yr							MT	/yr		
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	3.0000e- 005	1.0000e- 005	1.7000e- 004	0.0000	1.0000e- 005	0.0000	1.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0144	0.0144	0.0000	0.0000	0.0144
Total	3.0000e- 005	1.0000e- 005	1.7000e- 004	0.0000	1.0000e- 005	0.0000	1.0000e- 005	0.0000	0.0000	0.0000	0.0000	0.0144	0.0144	0.0000	0.0000	0.0144

4856 El Ca	mino Real, Los	Altos, CA								4856 El Ca	mino Real, Los	Altos, CA						
DPM Emis	sions and Mode	ling Emissi	on Rates							PM2.5 Fug	itive Dust Emiss	ions for M	odeling					
								DPM	ĺ									PM2.5
Emissions							Modeled	Emission									Modeled	Emission
Model		DPM	Area	DPM	A Emission	ıs	Area	Rate		Construction		Area		PM2.51	Emissions		Area	Rate
Year	Activity	(ton/year)	Source	(lb/yr)	(lb/hr)	(g/s)	(m <sup>2</sup> )	$(g/s/m^2)$		Year	Activity	Source	(ton/year)	(lb/yr)	(lb/hr)	(g/s)	(m <sup>2</sup> )	g/s/m <sup>2</sup>
2019	Construction	0.0354	1_DPM	70.8	0.02155	2.72E-03	2,898	9.37E-07		2019	Construction	FUG	0.0035	6.9	0.00211	2.66E-04	2,898	9.19E-08
Total		0.0354		70.8	0.0216	0.0027				Total			0.0035	6.9	0.0021	0.0003		
		Operation 1	Hours									Operation .	Hours					
		hr/day =	9	(7am - 4pm)								hr/day =	9	(7am - 4pr	n)			
		days/yr=	365									days/yr=	365					
	h	nours/year =	3285									hours/year =	3285					

4856 El Camino	Real, Los Alt	os, CA - I	<b>Health Im</b>	pact Sun	nmary	
Maximum Impac	ets at Constru	ction MEI	Location	1		
	Maximum Con	centrations				Maximum
Emissions	Exhaust PM10/DPM	Fugitive PM2.5	Cancer (per m		Hazard Index	Annual PM2.5 Concentration
Year	(μg/m <sup>3</sup> )	(μg/m <sup>3</sup> )	Child	Adult	(-)	(μg/m <sup>3</sup> )
2019	0.2623	0.0352	36.6	0.8	0.052	0.30
Maximum	0.2623	0.0352	36.6	0.8	0.052	0.30

4856 El Camino	o Real, Los Alt	os, CA - H	lealth Im	pact Sun	nmary	
Maximum Impa	acts at Constru	ction PM2	2.5 MEI 1	Location		
	Maximum Con	centrations				Maximum
	Exhaust	Fugitive	Cance	r Risk	Hazard	Annual PM2.5
Emissions	PM10/DPM	PM2.5	(per m	illion)	Index	Concentration
Year	$(\mu g/m^3)$	(μg/m <sup>3</sup> )	Child	Adult	(-)	(μg/m <sup>3</sup> )
2019	0.2609	0.0404	36.4	0.7	0.052	0.30
Maximum	0.2609	0.0404	36.4	0.7	0.052	0.30

4856 El Ca	amino Real											
		cer Risk Calc		rom Con	struction							
		eceptors-1.5		Tom Con								
тирасть ат	OII-SILE K	eceptors-1.5	ine te i									
C D: 1 /		CDE III	D 4.0	E ED/AT	FAIL 14	NEC .						
	•	CPF x Inhalatio			x FAH x I.	JE6						
Where:		er potency facto										
		sensitivity facto		ed age grou	р							
		ure duration (yea										
		aging time for life			)							
		tion of time sper		ınitless)								
Inhalation Do	$ose = C_{air} \times D$	BR x A x (EF/365	) x 10 <sup>-6</sup>									
Where:	Cair = conce	entration in air (µ	g/m <sup>3</sup> )									
		breathing rate (		veight-day)								
		ion absorption fa		l cigiri day)								
		ure frequency (d										
		ersion factor										
	10 – Conv	ersion factor										
Values												
			Infant/C	hild		Adult						
	Age ->	3rd Trimester	0 - 2	2 - 9	2 - 16	16 - 30						
	Parameter											
	ASF=	10	10	3	3	1						
	CPF =	1.10E+00	1.10E+00	1.10E+00	1.10E+00	1.10E+00						
	DBR* =	361	1090	631	572	261						
	A =	1	1	1	1	1						
	EF =	350	350	350	350	350						
	AT=	70	70	70	70	70						
	FAH=	0.85	0.85	0.72	0.72	0.73						
	* 95th perce	ntile breathing rate	s for infants a	and 80th perc	entile for chi	ldren and adults						
Construction	on Cancer	Risk by Year	· - Maxim	um Impac	t Recepto	r Location						
Construction	on Cancer	Risk by Year					Adult -	Exposure In	formation	Adult		
Construction					Informatio	Infant/Child		Exposure In		Adult Cancer		
	Exposure		nfant/Child	- Exposure	Information Age	Infant/Child Cancer	Mo	deled	Age	Cancer	Fugitive	Total
Construction  Exposure  Year	Exposure Duration	1		- Exposure	Informatio	Infant/Child Cancer Risk	Mo			Cancer Risk	Fugitive PM2.5	
Exposure	Exposure		nfant/Child DPM Con	- Exposure c (ug/m3)	Information Age Sensitivity	Infant/Child Cancer	Mo DPM Co	odeled onc (ug/m3)	Age Sensitivity	Cancer		
Expos ure Year	Exposure Duration (years)	Age	nfant/Child DPM Con	- Exposure c (ug/m3) Annual	Information Age Sensitivity Factor	Infant/Child Cancer Risk (per million)	Mo DPM Co	odeled onc (ug/m3) Annual	Age Sensitivity	Cancer Risk		PM2.
Exposure Year	Exposure Duration (years) 0.25	Age -0.25 - 0*	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000	Age Sensitivity Factor	Infant/Child Cancer Risk (per million)	Mo DPM Co Year	odeled onc (ug/m3) Annual 0.0000	Age Sensitivity Factor	Cancer Risk (per million)	PM2.5	PM2.
Exposure Year 0	Exposure Duration (years) 0.25	Age -0.25 - 0* 0 - 1	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623	Age Sensitivity Factor 10 10	Infant/Child Cancer Risk (per million) 0.00 36.62	Mo DPM Co Year	odeled onc (ug/m3) Annual 0.0000 0.2623	Age Sensitivity Factor - 1	Cancer Risk (per million) - 0.75	PM2.5	PM2.
Exposure Year 0 1 2	Exposure Duration (years) 0.25 1 1	Age -0.25 - 0* 0 - 1 1 - 2	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000	Age Sensitivity Factor 10 10 10	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00	Mo DPM Co Year	odeled onc (ug/m3) Annual 0.0000 0.2623 0.0000	Age Sensitivity Factor - 1	Cancer Risk (per million) - 0.75 0.00	PM2.5	PM2.
Exposure Year 0 1 2 3	Exposure Duration (years) 0.25 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00	Mo DPM Co Year	odeled onc (ug/m3) Annual 0.0000 0.2623 0.0000 0.0000	Age Sensitivity Factor - 1 1 1	Cancer Risk (per million) - 0.75 0.00 0.00	PM2.5	PM2.
Exposure	Exposure Duration (years) 0.25 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000 0.0000 0.0000	Informatio Age Sensitivity Factor 10 10 10 3 3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00	Mo DPM Co Year	No. (ug/m3)   Annual   0.0000   0.2623   0.0000   0.0000   0.0000   0.0000	Age Sensitivity Factor - 1 1 1 1	Cancer Ris k (per million) - 0.75 0.00 0.00 0.00	PM2.5	PM2.
Exposure	Exposure Duration (years) 0.25 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000 0.0000 0.0000 0.0000	Informatio Age Sensitivity Factor 10 10 10 3 3 3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00	Mo DPM Co Year	deled	Age Sensitivity Factor  - 1 1 1 1 1	Cancer Ris k (per million) - 0.75 0.00 0.00 0.00 0.00	PM2.5	PM2.5
Exposure Year 0 1 2 3 4 5 6	Exposure Duration (years) 0.25 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual   0.0000   0.2623   0.0000   0.0000   0.0000   0.0000   0.0000   0.0000   0.0000   0.0000   0.0000   0.0000   0.0000	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1	Cancer Risk (per million) - 0.75 0.00 0.00 0.00 0.00 0.00 0.00	PM2.5	PM2.5
Exposure	Exposure Duration (years) 0.25 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million) - 0.75 0.00 0.00 0.00 0.00 0.00 0.00 0.00	PM2.5	PM2.
Exposure	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual   0.0000   0.2623   0.0000   0	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million) - 0.75 0.00 0.00 0.00 0.00 0.00 0.00 0.00	PM2.5	PM2.
Exposure	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 3 3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Ris k (per million) - 0.75 0.00 0.00 0.00 0.00 0.00 0.00 0.00	PM2.5	PM2.
Exposure	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 3 3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Ris k (per million) 0.75 0.00 0.00 0.00 0.00 0.00 0.00 0.00	PM2.5	PM2.
Exposure  Year  0 1 2 3 4 5 6 7 8 9 10 11	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 3 3 3 3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Ris k (per million)	PM2.5	PM2.
Exposure  Year  0 1 2 3 4 5 6 7 8 9 10 11 12	Exposure  Duration (years)  0.25  1  1  1  1  1  1  1  1  1  1  1  1  1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 3 3 3 3 3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Ris k (per million) 0.75 0.00 0.00 0.00 0.00 0.00 0.00 0.00	PM2.5	PM2.
Exposure  Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13	Exposure  Duration (years)  0.25  1  1  1  1  1  1  1  1  1  1  1  1  1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 3 3 3 3 3 3 3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Ris k (per million) 0.75 0.00 0.00 0.00 0.00 0.00 0.00 0.00	PM2.5	PM2.
Exposure Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information   Age   Sensitivity   Factor   10   10   3   3   3   3   3   3   3   3   3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Ris k (per million) 0.75 0.00 0.00 0.00 0.00 0.00 0.00 0.00	PM2.5	PM2.
Exposure Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information   Age   Sensitivity   Factor   10   10   3   3   3   3   3   3   3   3   3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million) 0.75 0.00 0.00 0.00 0.00 0.00 0.00 0.00	PM2.5	PM2.
Exposure Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information   Age   Sensitivity   Factor   10   10   10   3   3   3   3   3   3   3   3   3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2.
Exposure  Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16-17	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Informatio   Age   Sensitivity   Factor   10   10   10   3   3   3   3   3   3   3   3   3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2.
Exposure  Year  0  1  2  3  4  5  6  7  8  9  10  11  12  13  14  15  16  17	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16 - 17 17 - 18	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Informatio   Age   Sensitivity   Factor   10   10   10   3   3   3   3   3   3   3   3   3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2.
Exposure  Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16 - 17 17 - 18 18 - 19 19 - 20	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000	Informatio   Age   Sensitivity   Factor   10   10   10   3   3   3   3   3   3   3   3   3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2.
Exposure  Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16 - 17 17 - 18 18 - 19 19 - 20 20 - 21	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000	Informatio   Age   Sensitivity   Factor   10   10   10   3   3   3   3   3   3   3   3   3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Ris k (per million)	PM2.5	PM2.
Exposure Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age  -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16 - 17 17 - 18 18 - 19 19 - 20 20 - 21 21 - 22	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000	Information   Age   Sensitivity   Factor   10   10   3   3   3   3   3   3   3   3   3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Ris k (per million)	PM2.5	PM2.
Exposure Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age  -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16 - 17 17 - 18 18 - 19 19 - 20 20 - 21 21 - 22 22 - 23	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000	Information   Age   Sensitivity   Factor   10   10   10   3   3   3   3   3   3   3   3   3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million) 0.75 0.00 0.00 0.00 0.00 0.00 0.00 0.00	PM2.5	PM2.
Exposure Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age  -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16-17 17-18 18-19 19-20 20-21 21-22 22-23 23-24	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000	Informatio   Age   Sensitivity   Factor   10   10   10   3   3   3   3   3   3   3   3   3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2.
Exposure Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age  -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16 - 17 17 - 18 18 - 19 19 - 20 20 - 21 21 - 22 22 - 23 23 - 24 24 - 25	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000	Informatio   Age   Sensitivity   Factor   10   10   10   3   3   3   3   3   3   3   3   3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2.
Exposure  Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16 - 17 17 - 18 18 - 19 19 - 20 20 - 21 21 - 22 22 - 23 23 - 24 24 - 25 25 - 26	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000	Informatio   Age   Sensitivity   Factor   10   10   10   3   3   3   3   3   3   3   3   3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2.
Exposure  Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16-17 17-18 18-19 19-20 20-21 21-22 22-23 23-24 24-25 25-26 26-27	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000	Informatio   Age   Sensitivity   Factor   10   10   10   3   3   3   3   3   3   3   3   3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2.
Exposure  Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16 - 17 17 - 18 18 - 19 19 - 20 20 - 21 21 - 22 22 - 23 23 - 24 24 - 25 25 - 26 26 - 27 27 - 28	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000	Informatio   Age   Sensitivity   Factor   10   10   10   3   3   3   3   3   3   3   3   3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2.
Exposure Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28 29	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16 - 17 17 - 18 18 - 19 19 - 20 20 - 21 21 - 22 22 - 23 23 - 24 24 - 25 25 - 26 26 - 27 27 - 28 28 - 29	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000	Informatio   Age   Sensitivity   Factor   10   10   10   3   3   3   3   3   3   3   3   3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2.
Exposure  Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age  -0.25 - 0*  0 - 1  1 - 2  2 - 3  3 - 4  4 - 5  5 - 6  6 - 7  7 - 8  8 - 9  9 - 10  10 - 11  11 - 12  12 - 13  13 - 14  14 - 15  15 - 16  16 - 17  17 - 18  18 - 19  19 - 20  20 - 21  21 - 22  22 - 23  23 - 24  24 - 25  25 - 26  26 - 27  27 - 28  28 - 29  29 - 30	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2623 0.0000	Informatio   Age   Sensitivity   Factor   10   10   10   3   3   3   3   3   3   3   3   3	Infant/Child Cancer Risk (per million) 0.00 36.62 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	Total PM2.5 0.298

4856 El Ca	imino Keai	, 1103 /11103,	J1 1									
Maximum	DPM Can	cer Risk Calc	ulations F	rom Cons	truction							
Impacts at	Off-Site R	eceptors-1.5	meter, PN	12.5 MEI								
		_										
Cancer Risk (	per million) =	CPF x Inhalatio	n Dose x AS	F x ED/AT	x FAH x 1.0	0E6						
,		er potency facto										
		sensitivity facto			p							
		ure duration (ye			<u>-</u>							
		aging time for life		risk (years)								
	FAH = Frac	tion of time sper	nt at home (u	initless)								
Inhalation Do	se = Cair x D	BR x A x (EF/365	0 x 10 <sup>-6</sup>									
		entration in air (µ										
W Hele.		breathing rate (		voight day)								
		ion absorption fa		veigiit-day)								
		ure frequency (d										
		ersion factor										
	10 - Conv	CISION IACIOI										
Values	ļ											
			Infant/C			Adult						
	_	3rd Trimester	0 - 2	2 - 9	2 - 16	16 - 30						
	Parameter											
	ASF =	10	10	3	3	1						
	CPF =	1.10E+00	1.10E+00	1.10E+00	1.10E+00	1.10E+00						
	DBR* =	361	1090	631	572	261						
	A = EF =	350	350	350	350	350						
	AT =	70	70	70	70	70						
	FAH=	0.85	0.85	0.72	0.72	0.73						
		ntile breathing rate										
	23th perce	lithe oreathing rate	5 TOT IIITUITES 0	ina ootii pere	circine for emi	laren ana adaits						
Construct		Risk by Year	Marim	T	t Dagante	T 4°						
	on Cancer											
Constructi	on Cancer I						Adult -	Evnosure In	formation	Adult		
Constructi			nfant/Child		Informatio	Infant/Child		Exposure In		Adult Cancer		
	Exposure Duration		nfant/Child	- Exposure	Informatio Age	Infant/Child Cancer	Mo	odeled	Age	Cancer	Fugitive	Total
Exposure Year	Exposure			- Exposure	Informatio	Infant/Child Cancer	Mo	odeled	Age	Cancer	Fugitive PM2.5	
Exposure	Exposure Duration	1	nfant/Child DPM Con	- Exposure c (ug/m3)	Informatio Age Sensitivity	Infant/Child Cancer Risk	Mo DPM Co	odeled onc (ug/m3)	Age Sensitivity	Cancer Risk		
Exposure Year	Exposure Duration (years)	Age	nfant/Child DPM Con	- Exposure c (ug/m3) Annual	Informatio Age Sensitivity Factor	Infant/Child Cancer Risk (per million)	Mo DPM Co	odeled onc (ug/m3) Annual	Age Sensitivity Factor	Cancer Risk (per million)		PM2
Exposure Year	Exposure Duration (years) 0.25	Age -0.25 - 0*	nfant/Child DPM Con Year	c (ug/m3) Annual 0.0000	Information Age Sensitivity Factor 10 10 10	Infant/Child Cancer Risk (per million)	Mo DPM Co Year	odeled onc (ug/m3) Annual 0.0000	Age Sensitivity Factor	Cancer Risk (per million)	PM2.5	PM2
Exposure Year 0 1 2 3	Exposure Duration (years) 0.25 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00	Mo DPM Co Year	odeled onc (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000	Age Sensitivity Factor - 1 1 1	Cancer Risk (per million) - 0.75 0.00 0.00	PM2.5	PM2.
Exposure Year 0 1 2 3 4	Exposure Duration (years) 0.25 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00	Mo DPM Co Year	odeled nc (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000	Age Sensitivity Factor - 1 1 1 1	Cancer Ris k (per million) - 0.75 0.00 0.00 0.00	PM2.5	PM2.
Exposure	Exposure Duration (years) 0.25 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00	Mo DPM Co Year	Annual   0.0000   0.2609   0.0000   0.0000   0.0000   0.0000   0.0000   0.0000   0.0000   0.0000   0.0000   0.0000   0.0000	Age Sensitivity Factor  - 1 1 1 1 1 1	Cancer Ris k (per million) - 0.75 0.00 0.00 0.00 0.00	PM2.5	PM2
Exposure	Exposure Duration (years) 0.25 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	Annual   0.0000   0.2609   0.0000   0.0000   0.0000   0.0000   0.0000   0.0000   0.0000   0.0000   0.0000   0.0000   0.0000	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1	Cancer Ris k (per million) - 0.75 0.00 0.00 0.00 0.00 0.00	PM2.5	PM2.
Exposure	Exposure Duration (years) 0.25 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	nc (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Age Sensitivity Factor - 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million) - 0.75 0.00 0.00 0.00 0.00 0.00 0.00 0.00	PM2.5	PM2
Exposure	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00 0.00 0.00 0.00 0.00	Mo DPM Co Year	nc (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million) - 0.75 0.00 0.00 0.00 0.00 0.00 0.00 0.00	PM2.5	PM2
Exposure	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00 0.00 0.00 0.00 0.00 0	Mo DPM Co Year	nc (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Age Sensitivity Factor  1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million) - 0.75 0.00 0.00 0.00 0.00 0.00 0.00 0.00	PM2.5	PM2
Exposure  Year  0 1 2 3 4 5 6 7 8 9 10	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 3 3	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00 0.00 0.00 0.00 0.00 0	Mo DPM Co Year	nc (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Age Sensitivity Factor  1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Ris k (per million)	PM2.5	PM2
Exposure  Year  0 1 2 3 4 5 6 7 8 9 10 11	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 3 3 3	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00 0.00 0.00 0.00 0.00 0	Mo DPM Co Year	nc (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2
Exposure  Year  0 1 2 3 4 5 6 7 8 9 10 11 12	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 3 3 3 3	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00 0.00 0.00 0.00 0.00 0	Mo DPM Co Year	ne (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Ris k (per million)	PM2.5	PM2
Exposure  Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13	Exposure  Duration (years)  0.25  1  1  1  1  1  1  1  1  1  1  1  1  1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 3 3 3 3 3 3 3	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00 0.00 0.00 0.00 0.00 0	Mo DPM Co Year	nc (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Ris k (per million)	PM2.5	PM2
Exposure Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 3 3 3 3 3 3 3	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00 0.00 0.00 0.00 0.00 0	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2
Exposure Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 3 3 3 3 3 3 3	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00 0.00 0.00 0.00 0.00 0	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million) 0.75 0.00 0.00 0.00 0.00 0.00 0.00 0.00	PM2.5	PM2
Exposure Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 3 3 3 3 3 3 3	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00 0.00 0.00 0.00 0.00 0	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2
Exposure Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 3 3 3 3 3 3 3	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00 0.00 0.00 0.00 0.00 0	Mo DPM Co Year	ne (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2
Exposure  Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16-17	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 3 1 3 1	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00 0.00 0.00 0.00 0.00 0	Mo DPM Co Year	ne (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2
Exposure  Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16 - 17 17 - 18	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 3 1 1 1	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00 0.00 0.00 0.00 0.00 0	Mo DPM Co Year	ne (ug/m3) Annual 0.0000 0.2609 0.0000	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2
Exposure  Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16 - 17 17 - 18 18 - 19	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 1 1 1	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00 0.00 0.00 0.00 0.00 0	Mo DPM Co Year	ne (ug/m3) Annual 0.0000 0.2609 0.0000	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2
Exposure Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age  -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16 - 17 17 - 18 18 - 19 19 - 20 20 - 21 21 - 22	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 1 1 1 1	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00 0.00 0.00 0.00 0.00 0	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2
Exposure Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age  -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16 - 17 17 - 18 18 - 19 19 - 20 20 - 21 21 - 22 22 - 23	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000	Information Age Sensitivity Factor  10 10 10 3 3 3 3 3 3 3 3 1 1 1 1 1 1 1	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00 0.00 0.00 0.00 0.00 0	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2
Exposure Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age  -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16-17 17-18 18-19 19-20 20-21 21-22 22-23 23-24	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 1 1 1 1 1 1 1	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00 0.00 0.00 0.00 0.00 0	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2
Exposure Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age  -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16 - 17 17 - 18 18 - 19 19 - 20 20 - 21 21 - 22 22 - 23 23 - 24 24 - 25	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 1 1 1 1 1 1 1	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00 0.00 0.00 0.00 0.00 0	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2
Exposure Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16 - 17 17 - 18 18 - 19 19 - 20 20 - 21 21 - 22 22 - 23 23 - 24 24 - 25 25 - 26	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 1 1 1 1 1 1 1	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00 0.00 0.00 0.00 0.00 0	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2
Exposure  Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16-17 17-18 18-19 19-20 20-21 21-22 22-23 23-24 24-25 25-26 26-27	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 1 1 1 1 1 1 1	Infant/Child Cancer Risk (per million) 0.00 36.42 0.00 0.00 0.00 0.00 0.00 0.00 0.00 0	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2
Exposure  Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16 - 17 17 - 18 18 - 19 19 - 20 20 - 21 21 - 22 22 - 23 23 - 24 24 - 25 25 - 26 26 - 27 27 - 28	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 1 1 1 1 1 1 1	Infant/Child   Cancer   Risk   (per million)   0.00   36.42   0.00   0	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2.
Exposure  Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28 29	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age -0.25 - 0* 0 - 1 1 - 2 2 - 3 3 - 4 4 - 5 5 - 6 6 - 7 7 - 8 8 - 9 9 - 10 10 - 11 11 - 12 12 - 13 13 - 14 14 - 15 15 - 16 16 - 17 17 - 18 18 - 19 19 - 20 20 - 21 21 - 22 22 - 23 23 - 24 24 - 25 25 - 26 26 - 27 27 - 28 28 - 29	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 1 1 1 1 1 1 1	Infant/Child   Cancer   Risk   (per million)   0.00   36.42   0.00   0	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	Total PM2. 0.301
Exposure  Year  0 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28	Exposure Duration (years) 0.25 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Age  -0.25 - 0*  0 - 1  1 - 2  2 - 3  3 - 4  4 - 5  5 - 6  6 - 7  7 - 8  8 - 9  9 - 10  10 - 11  11 - 12  12 - 13  13 - 14  14 - 15  15 - 16  16 - 17  17 - 18  18 - 19  19 - 20  20 - 21  21 - 22  22 - 23  23 - 24  24 - 25  25 - 26  26 - 27  27 - 28  28 - 29  29 - 30	nfant/Child DPM Con Year	- Exposure c (ug/m3) Annual 0.0000 0.2609 0.0000	Information Age Sensitivity Factor 10 10 10 3 3 3 3 3 3 3 3 1 1 1 1 1 1 1	Infant/Child   Cancer   Risk   (per million)   0.00   36.42   0.00   0	Mo DPM Co Year	Annual	Age Sensitivity Factor  - 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Cancer Risk (per million)	PM2.5	PM2.



# ALTOS ONE 4846/4856 EL CAMINO REAL LOS ALTOS, CALIFORNIA CCR TITLE 24 NOISE STUDY March 2018 Update

Revised March 6, 2018

**Prepared for:** 

LUXONE, LLC Mr. Mircea Voskerician 572 Chimalus Dr. Palo Alto, California 94306

Prepared by:

Derek L. Watry

Principal

Tom P. Ostrande

**Assistant** 

WI Project 16-088

Strander



#### 1 Introduction

This report presents an acoustical evaluation of the exterior noise and exterior to interior sound isolation for the proposed 4856 El Camino Real multi-family residential project to be constructed along El Camino Real between Los Altos Square and Jordan Avenue in the City of Los Altos, California. The proposed project is a five-story residential development of 35 units over one level of parking garage.

The purpose of this noise study is to assess the exterior noise environment of the subject property and to provide recommendations on the control of exterior-to-interior noise with respect to the requirements of the California Code of Regulations (CCR), Title 24 (included in the California Building Code Section 1207 - Sound Transmission Control) and the City of Los Altos General Plan Environmental Management Element. This report provides a description of the environmental noise survey methodology, a discussion of applicable noise standards, noise survey results, future noise level projections, and exterior-to-interior noise mitigation recommendations.

The project site's existing noise environment is primarily dominated by vehicle traffic along El Camino Real (State Route 82) on the north side, and by far away sources such as Showers Drive to the northwest. The City of Los Altos General Plan indicates that traffic volumes along El Camino Real are not expected to increase over the next 10 years. As such, the measured noise levels at the site today are expected to persist for the next 10 years.

Noise mitigation recommendations for project glazing, exterior assemblies, and exterior doors are presented, along with important installation details.

Inter-unit noise mitigation provisions, also required by CCR Title 24, include acoustical design and installation details for party walls, corridor walls, floor-ceiling assemblies, and other components. This design work is not included in this report.

#### 1.1 2018 Update

This report updates the building shell noise insulation analysis to reflect the new floorplans of 4856 El Camino Real. The current study is based on the drawing set dated 5 March 2018 by SDG Architects, Inc. The changes in design were primarily internal – some of the unit floorplans were altered and the number of units per floor changed. The building footprint was not significantly altered, and the size of the gap between this project and the neighboring project did not change. The revised glazing recommendations for the exterior walls of the building incorporates the additional units added to the floorplan drawings.



#### 2 Noise Level Descriptors

The noise exposure at a site, measured using the Day-Night Level ( $L_{dn}$ ) metric, represents the A-weighted equivalent continuous noise exposure level for a 24-hour period and includes a 10 decibel (dB) penalty added to sound levels during nighttime hours (10:00 pm to 7:00 am). The term "Equivalent Continuous Sound Exposure Level" ( $L_{eq}$ ) refers to a decibel level that equals the level of a steady noise containing the same total sound energy as the fluctuating community noise level for a given period of time. The 10 dB penalty added to sound levels during the nighttime hours is meant to account for higher sensitivity of people to noise during nighttime and evening hours, relative to the daytime. The A-weighted scale, used for community noise measurements, causes the measuring instrumentation to respond to noise in a manner closely correlated with the auditory response of the average person. A-weighting is implicit in noise levels reported in terms of  $L_{dn}$ .

More complete definitions for these and other acoustical terms can be found in the "Description of Acoustical Terms Relevant to Title 24 Projects" at the end of this report.

#### 3 Applicable Noise Standards – Noise Study Criteria

Noise Insulation Requirements. California Code of Regulations (CCR) Title 24 – included in the amended California Building Code (CBC), Section 1207, "Sound Transmission" – specifies the maximum level of interior noise due to exterior sources allowable for new residential developments. Division II of the CBC, Appendix 12 presents acoustical requirements in general terms, with more specific language provided in Division IIA of Appendix 12. CCR Title 24 also defers to local requirements where applicable.

CCR Title 24 requires that the building be designed to have sound insulation so that, with all exterior doors and windows in the closed position, the interior noise level attributable to exterior sources shall not exceed an annual  $L_{dn}$  of 45 in any habitable room.

The Natural Environment and Hazards Element of the Los Altos General Plan reference the State of California noise insulation standards, explicitly citing the 45  $L_{dn}$  interior noise standard for residential space. The Element requires acoustical studies such as this one for developments where the noise level exceeds 60  $L_{dn}$  from industrial or transportation sources. The study must demonstrate compliance with the interior noise standard.

The Natural Environment & Hazards Element of the City of Los Altos General Plan also states that new development can be made compatible with the noise environment by utilizing the Land Use Compatibility Guidelines. Land uses and their compatibility with various noise criteria, as adopted by the City of Los Altos, is shown graphically in Figure 1, below, reproduced from the Natural Environment & Hazards Element.

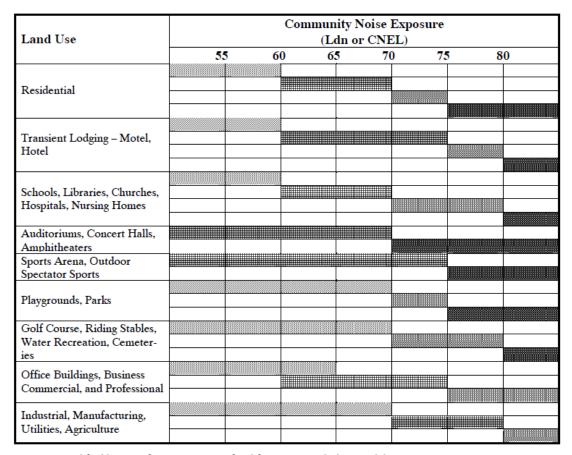
As seen in Figure 1, residential development is considered Normally Acceptable in areas where the exterior noise exposure is less than  $60~L_{dn}$ . Areas between 60~and 70~L $_{dn}$  are considered Conditionally Acceptable, and detailed noise analysis is required to substantiate that proper noise reduction measures are included in the project design. Areas between 70~and 75~L $_{dn}$  are considered Normally Unacceptable for new residential development, but is allowed provided that a detailed



noise analysis is done and adequate noise reduction measurements are included in the project design.

The City of Los Altos Municipal Code at Chapter 6, Section 16.050, Exterior Noise Limits, contains absolute noise limits for various categories of land use under differing conditions. For the purpose of this study, these limits will be applied to HVAC and other mechanical noises associated with the project, and we are assuming that this equipment will, at times, have duty cycles that exceeded 30 minutes of use per hour. As such, the most restrictive noise limits will apply. At the neighboring commercial properties (C Zoning), the applicable limits are 60 dBA between 10 PM and 7 AM and 65 dBA between 7 AM and 10 PM [Code Section 6.16.050, Table 1]. For the neighboring residential units, the limits in Section 16.050 Table 1 are modified because they border another type of zoning. Per 6.16.050.A.4, when two zones abut, "the noise level limit applicable to the lower noise zone, plus five dB, shall apply." As such, the applicable limits at the residential properties are 55 dBA between 10 PM and 7 AM and 60 dBA between 7 AM and 10 PM.





Source: Modified by CBA from 1998 State of California General Plan Guidelines.

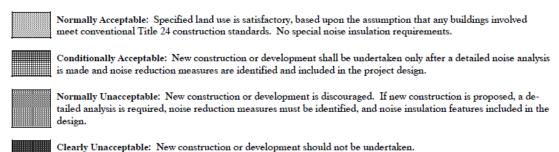


Figure 1: Land Use/Noise Compatibility Chart (from Los Altos' Natural Environment & Hazards Element of the 2002 General Plan, page 10)



<u>Ventilation Requirements.</u> Provision of adequate ventilation falls under the purview of the project mechanical engineer. However, it is related to acoustics because the requirement for acoustically-rated windows also triggers a requirement for mechanical ventilation. Specifically, for areas of the Project where the exterior noise exposure exceeds  $60~L_{dn}$ , an alternative means of ventilation is usually required. We recommend you bring this to the attention of the project mechanical engineer.

#### 4 Environmental Noise Survey Methodology

Wilson Ihrig also prepared the environmental noise study for the neighboring project at 4880 El Camino Real. In email correspondence with Zachary Dahl of the City of Los Altos Community Development Department, it was confirmed that the environmental noise measurements made for that project in February 2016 could serve as the basis for the design of this project. The environmental noise survey consisted of both short-term noise recordings and long-term noise measurement efforts at several locations in the project vicinity. Table I summarizes the noise measurement locations, with distances to adjacent sources and the types of measurements performed at each. Figure 2 shows the measurement locations (and the building at 4880 El Camino Real at the time of measurement).

#### **Long-Term Measurements**

Long-term, statistical noise levels were measured at the site by means of four precision, calibrated, Type 1 logging sound level meters left unattended at the site to monitor complete days between Thursday, 18 February 2016 and Tuesday, 23 February 2016, inclusive. Long-term meters were placed at the locations indicated in Table I and Figure 2 (indicated as LT-1 to LT-4), where they could be secured to light poles and a tree. Microphone heights are approximately 12 ft to 15 ft above grade in this mounting arrangement. The sound meters monitored noise levels continuously during the survey period, providing hourly-averaged and statistical noise levels over six complete days. The hourly equivalent noise data ( $L_{\rm eq}$ ) were then used to calculate the daily and typical Day-Night Levels ( $L_{\rm dn}$ ), as required by the CCR Title 24 and the City of Los Altos General Plan Natural Environment & Hazards Element.

#### **Short-Term Measurement**

At short-term location ST, calibrated, digital recordings were made on Tuesday, 17 February 2016 for approximately 10 minutes to determine the spectral content of the noise.



**Table I: Environmental Noise Survey Measurement Locations** 

Label	Measurement Type	Location Description
LT-1	Long-Term	Light Pole at North Property Line
		~ 75' from El Camino Real CL
LT-2 & ST	Long & Short-Term	Light Pole at North Property Line
		~ 72' from El Camino Real CL
LT-3	Long-Term	Tree at East Property Line
		~ 175' from El Camino Real CL
LT-4	Long-Term	Light Pole at South Property Line
		~ 283' from El Camino Real CL

#### 5 Environmental Noise Survey Results

Exterior-to-interior noise isolation requirements were determined by evaluating the existing and projected future noise levels at the project site.

#### 5.1 Measured Existing Noise Levels

The results of the environmental noise survey reveal that existing noise levels across the area range from 71  $L_{dn}$  near El Camino Real to 58  $L_{dn}$  near the rear property line. This puts the majority of the site in the Conditionally Acceptable category for residential land use. The day-night noise levels over the course of the long-term noise survey are summarized by location in Table II. Figure 3A to 3D present the hourly averaged  $L_{eq}$  and calculated  $L_{dn}$  levels. The data show marginally higher noise levels on weekdays, when car and truck traffic in the vicinity are presumably greater. Lower levels are particularly evident on weekend mornings, due to the absence of a defined commute period.

The noise frequency spectrum provided by the short-term (ST) measurement is consistent with noise environments dominated by vehicle traffic. The spectrum is shown Figure 4.

Table II: Summary of Measured Existing Day Night Noise Levels By Measurement Location (See also Figure 3A to Figure 3D)

	Location LT-1	Location LT-2	Location LT-3	Location LT-4
Ldn – Tue, 18 Feb 2016	71	72	62	59
Ldn – Wed, 19 Feb	70	72	62	58
Ldn – Thu, 20 Feb	69	70	60	57
Ldn – Fri, 21 Feb	69	70	61	57
Ldn – Sat, 22 Feb	70	72	62	58
Ldn – Sun, 23 Feb	70	71	62	59
Existing Average Ldn	70	71	61	58



#### **5.2** Projected Future Noise Levels

According to the City of Los Altos General Plan, average daily traffic along El Camino Real in front of the project site is expected to increase from 44,500 vehicles in 2001 (Table NEH-2) to 50,000 in 2025 (Table NEH-3). The mix of automobiles, medium trucks, and heavy truck is not expected to change. Given this information, the expected increase in noise due to traffic increase over the 24 year period is 0.5 dB. However, because the current date is 16 years into the 24 year period, it is expected that 0.3 dB of this increase has already occurred, implying that the increase between noise and 2025 or 2026 is on the order of 0.2 dB, a negligible amount. Therefore, for the purposes of this study, future noise levels are taken to be the same as today.

The noise contours are essentially the same as those developed for the 4880 El Camino Real project. At the west façade of Altos One on the 4856 El Camino Real parcel, this should be self-evident because it is very analogous to the east façade of 4880 El Camino Real in terms of exposure to the roadway. The west façade of the current project on the 4856 El Camino Real parcel will be well shielded from the roadway so the noise levels there will be at least 5 dB lower which will put them well below the  $L_{dn}$  60 level at which noise mitigation is required.

The east façade of Altos One will face the equally large west façade of 4880 El Camino Real, the two buildings being separate by 13 to 18 feet at various points. This will cause the space to be somewhat reverberant which will increase noise levels by 3 to 6 dB depending on how "deep" one is in the gap. However, the incident roadway noise in the narrow gap between the buildings will be less than if the façade were wholly exposed to El Camino Real, again depending on how deep one is in the gap. Using the standard method of assessing the noise from a finite section of roadway, we estimate that the noise level will be 6 dB down at a distance of 14 feet from the front façade of the building (see Endnote 1). Beyond that, the noise level would be even less. Therefore, as a practical matter, the environmental noise levels in the gap between the two buildings will be approximately the same or less as on the fully exposed west façade.

Figures 5A to 5D shows the noise contours utilized for determination of glazing requirements.

#### 6 Noise Mitigation Recommendations

#### 6.1 Exterior Glazing

Windows are inherently the weak link of a residential project's exterior acoustical envelope. Therefore, proper selection and installation of exterior glazing elements are paramount to achieving CCR Title 24 interior noise limits. Frames of windows and doors must be caulked with resilient, acoustical sealant to provide an airtight seal. Also, a bead of resilient, acoustical caulking must be applied to window casings before installation. Manufacturer's instructions for installation of acoustically rated window assemblies must be followed carefully, so that installed windows retain their rated acoustical performance.

Recommendations are presented in terms of the Outdoor-Indoor Transmission Class (OITC) and Sound Transmission Class (STC) acoustical performance ratings, either of which may be used to specify windows for the project, though the OITC rating is preferable. The window manufacturer



shall provide laboratory test data for the specific window assembly types submitted for this project. Laboratory test reports should include third octave band sound isolation performance data for the specific glazing system proposed. Window manufacturers may provide alternative glazing configurations which might be more appropriate for this project, provided that these possess the minimum recommended OITC ratings.

Traditionally, manufacturers of exterior doors and windows have used the single-number Sound Transmission Class (STC) metric to rate the acoustical performance of their products. However, STC is a metric optimized for the spectral shape (or tonal quality) of human speech, as it was originally developed as a means to rate the degree of sound isolation between dwelling units in the late 1950's. The Outdoor-Indoor Transmission Class (OITC), as defined in the ASTM Standard E1332, is the *preferred metric* for rating the sound performance of building shell materials. OITC ratings are tied to a typical noise spectrum shape from transportation sources, which are rich in low frequency, bass-type sounds, as opposed to the frequencies of human speech or television audio. Both OITC and STC rating values are calculated from 1/3-octave band transmission loss data for specific building shell components.

Our acoustical glazing recommendations for the project are shown in Figure 6A for Floor 1, Figure 6B for Floor 2, Figure 6C for Floors 3, and Figure 6D for Floors 4 and 5. Two classes of exterior glazing are indicated for windows and balcony doors in Figures 6A to 6D:

- Glazing Class I with a minimum OITC 24 / STC 32 rating
- Glazing Class II with a minimum OITC 22 / STC 30 rating

The recommendations assume that the condominium units will have hard surface finishes, leading to a high level of reverberation in comparison to rooms that are carpeted. If the units in the project are going to be carpeted, the recommend OITC/STC ratings may be relaxed by 2 points. If this is done, the projects Conditions, Covenants, and Restrictions should prevent future owners from replacing the carpet with hardwood flooring.

These recommendations are for habitable rooms within residential units ("R" occupancy) and to the Gathering/Family Playroom on Floor 2 that directly faces El Camino Real. They do not apply to other common rooms and areas, corridors, public stair wells, storage areas, commercial spaces, garages, etc. All other façade sections where no specific OITC/STC recommendations are given do not require acoustically-rated glazing.

Many glazing configurations are produced that meet the above minimum requirements. In addition, glazing systems with dissimilar thickness panes are strongly recommended, unless one of the panes has *laminated glass*.

#### **6.2** Exterior Walls

The proposed main exterior wall construction per SDG Architects is one layer of 5/8" gypsum board on the interior face of the wall, 2x6 wood studs, R19 fiberglass batt insulation in the stud cavity, and either stucco, wood, or metal panels on the exterior. Assemblies similar to the assemblies listed above have been tested to have a sound insulation rating of at least OITC 37 (comparable to STC



46), which will not compromise the sound isolation of the building envelope if all gaps are well-sealed with non-hardening, acoustical caulk.

The ultimate degree of sound isolation provided by the building shell is highly dependent on the quality of workmanship and attention to detail that is followed during construction. The following recommendations are aimed at delivering the full sound isolating potential of the building shell:

- If possible, avoid electrical outlets in exterior walls. If this is not possible, apply outlet box pads such as those manufactured by Lowry's or Dottie (#68 pads) to all electrical boxes in exterior walls, as one would in all corridor, party and other sound rated interior walls. Thoroughly caulk around all edges of electrical outlet boxes and other penetrations with non-hardening acoustical sealant.
- Carefully caulk the intersection between the interior layer of gypsum wall board at the floor and ceiling with resilient, non-hardening acoustical sealant.
- Fully fill the stud cavities with batt insulation, as the improvement in sound isolation provided by the partition is directly proportional to the percentage of the cavity filled with insulation. For exterior walls constructed with 8" studs, the use of two layers of slightly compressed R-13 batt insulation is highly recommended.

### 6.3 Supplemental Ventilation

As mentioned above, any habitable room that is required to have an acoustically-rated window (see Figures 6A through 6D) are also required to provide for alternative ventilation so that the windows may remain closed for noise reduction purposes. This requirement should be addressed by the project mechanical engineer.

Supplemental ventilation can be provided in several forms. A ducted fresh air system could be incorporated into the HVAC system. Other projects have used passive, ducted air inlets that extend from the building's rooftop to soffits within each unit. Ducted air inlets should be acoustically lined through the first 10 feet in length away from the exterior opening and incorporate one or more 90-degree bends between openings, so as to not compromise the noise insulating performance of the residential unit's exterior envelope. Instead of serving unit stacks with a vertical duct drawing air from the room, air could also be drawn through the floor-ceiling assembly to a register in the ceiling. In either system, ducts should be located within gypsum shafts so as to not create a direct noise path from exterior penetration to the unit interior. We will gladly review and comment on designs provided by the project's architect or mechanical engineer.

Another means of providing fresh air ventilation without compromising the degree of acoustical isolation is to incorporate a "Z-duct" fresh air intake device in the building façade. If a Z-duct method is chosen to provide outside air intake at individual units, the vertical duct should be at least 5 ft in length, and lined with 1/2" or 1" thick acoustical liner. These requirements are essential to make the Z-duct provide adequate noise insulation and not compromise the noise insulating performance of the window and wall assemblies. Commercially available units include the Vibro-Acoustics model CT silencer (http://www.vibro-acoustics.com/).



### 6.4 Mechanical Equipment Noise Control

The project design is not far enough along at this point to select mechanical equipment that will service the building. Such equipment will include HVAC equipment and may include an emergency backup generator. The current plans indicate that the mechanical equipment will be located at the rooftop level which will cause most of the noise to be projected upward. However, during design of the mechanical systems, the noise levels from the various pieces of equipment on the rooftop should be calculated to ensure compliance with The City of Los Altos Municipal Code, Chapter 6, Section 16.050, Exterior Noise Limits. Rooftop equipment will also require vibration isolation from the rooftop to prevent structure-borne noise from propagating into the units below.

No equipment is anticipated for a project of this scale that would make meeting the applicable noise limits with standard noise control measures difficult nor from preventing unacceptable levels of structure-borne noise in the units below.

\* \* \* \* \*



#### **Endnotes:**

1. The formula for the sound pressure of a road of finite length at a receiver a distance D away is:

$$p^2 = \frac{\rho_0 c \Pi \Theta}{\pi D}$$

p = sound pressure

 $\rho_0 c$  = acoustic impedance of air

 $\Pi$  = the sound power of the roadway noise

 $\Theta$  = the angle between the receiver and the road (radians)

D = the distance between the receiver and the road

(Reference: Lyon, R. H., Lectures in Transportation Noise, Grozier Publishing, 1973)

Decibel levels are calculated as  $10\log_{10}(p/p_{ref})^2$ , where  $p_{ref}$ , the reference pressure, is  $20 \mu Pa$ . Using these equations to compare the decibel level from a finite roadway segment compared to an "infinite" (fully exposed) roadway segment, one gets

Difference in dB =  $10log_{10}[(\Theta/\pi)(D_{facade}/(D_{facade}+D_{gap}))]$ 

 $D_{facade}$  = distance from roadway centerline to façade  $D_{gap}$  = distance from façade to position in gap

For the geometry of the buildings and roadway in this case, the difference is -6.0 dB at a distance of 14 feet into the gap ( $D_{gap}$ ).



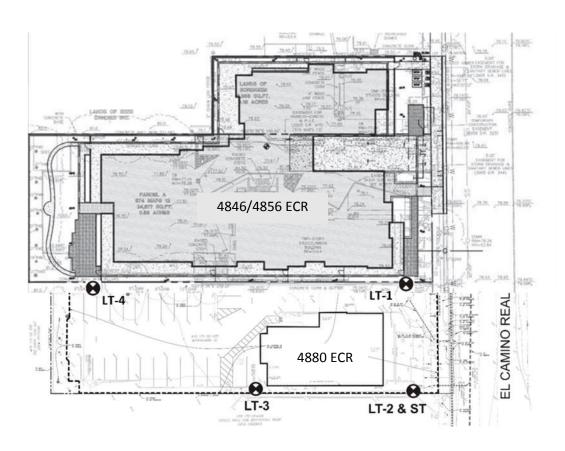


Figure 2: Noise survey locations

(4880 ECR at time of measurement. 4856 ECR proposed building.)



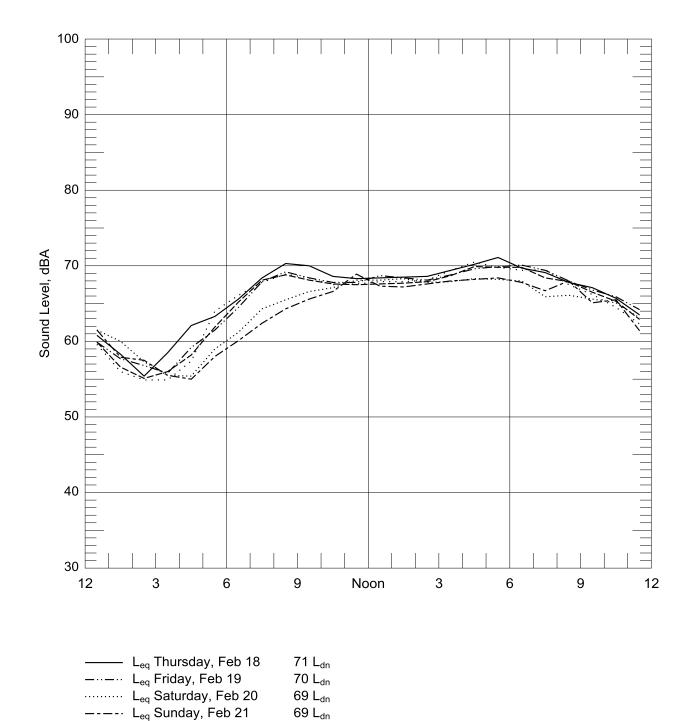


Figure 3A: Hourly Equivalent (Leq) and Day-Night (Ldn) Levels measured at Location LT-1

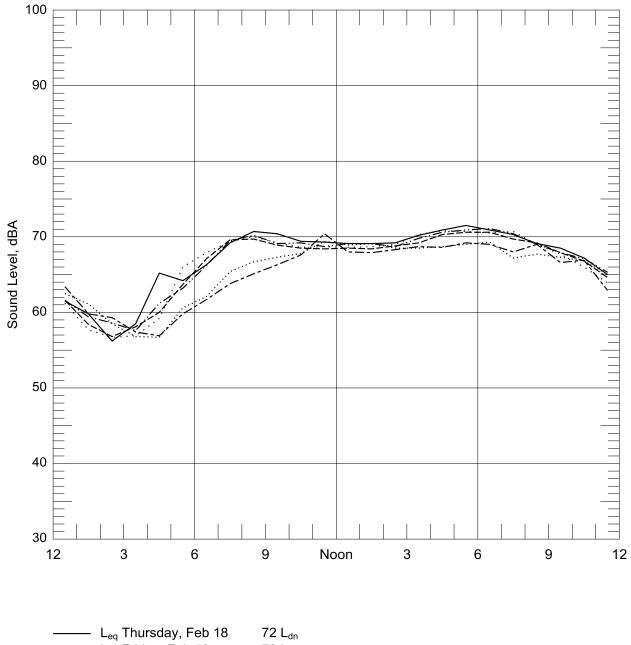
 $70 L_{dn}$ 

 $70\;L_{dn}$ 

L<sub>eq</sub>, Monday Feb 22

L<sub>eq</sub>, Tuesday, Feb 23





 L <sub>eq</sub> Inursday, Feb 18	/ Z L <sub>dn</sub>
 L <sub>eq</sub> Friday, Feb 19	$72 L_{dn}$
 L <sub>eq</sub> Saturday, Feb 20	$70 L_{dn}$
 L <sub>eq</sub> Sunday, Feb 21	$70 L_{dn}$
 L <sub>eq</sub> , Monday Feb 22	$72 L_{dn}$
 L <sub>eq</sub> , Tuesday, Feb 23	$71 L_{dn}$

Figure 3B: Hourly Equivalent (Leq) and Day-Night (Ldn) Levels measured at Location LT-2



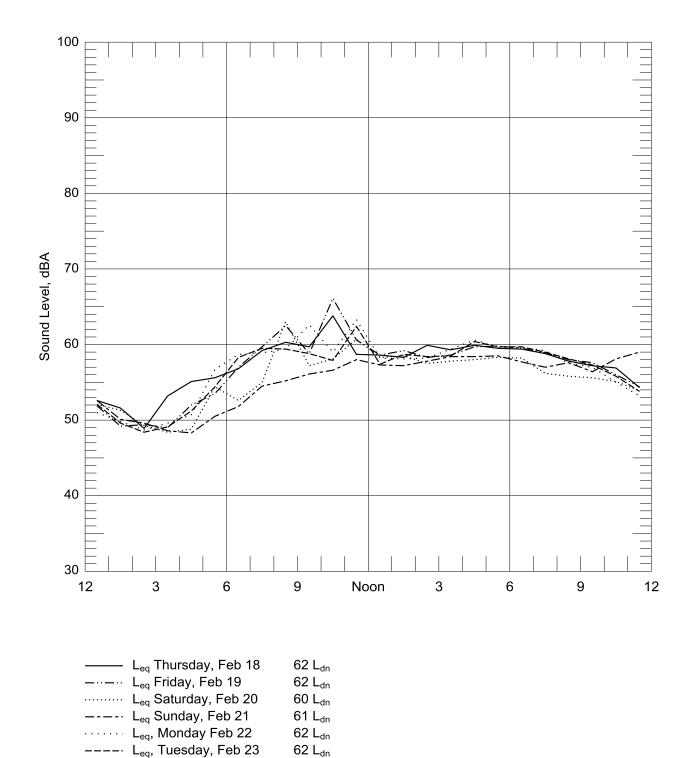


Figure 3C: Hourly Equivalent (Leq) and Day-Night (Ldn) Levels measured at Location LT-3



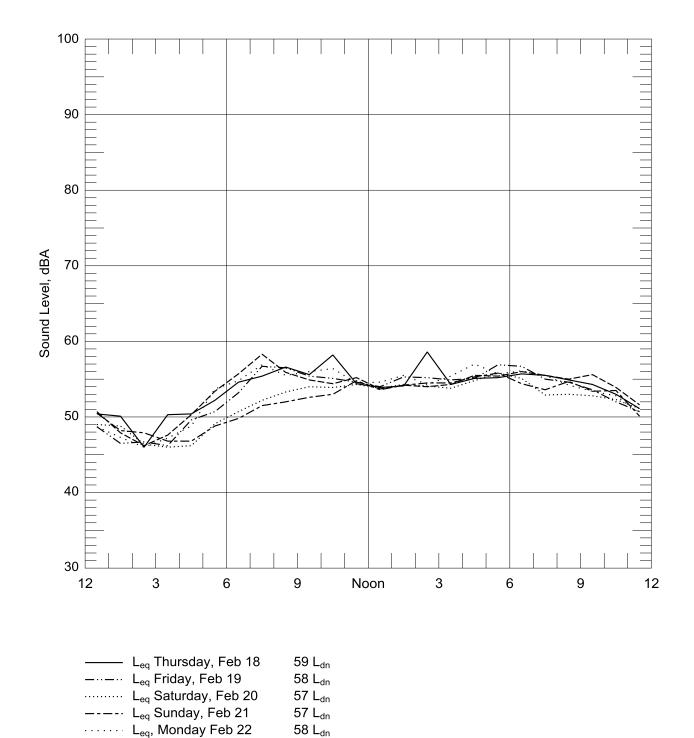
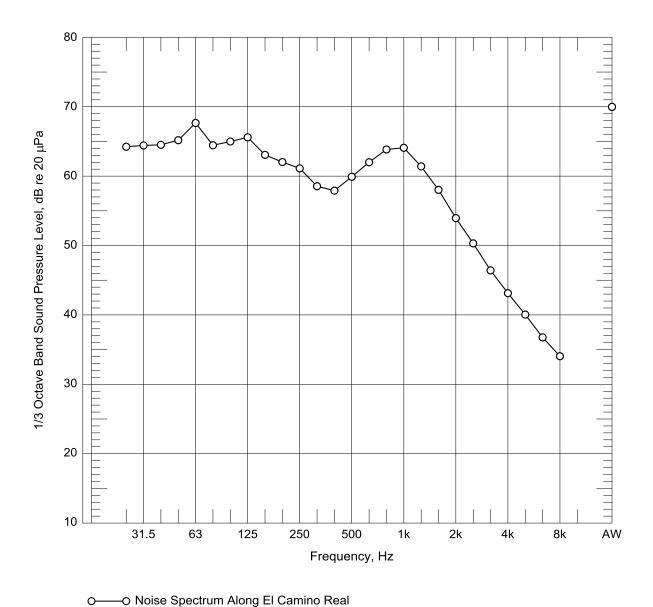


Figure 3D: Hourly Equivalent (Leq) and Day-Night (Ldn) Levels measured at Location LT-4

 $59\;L_{dn}$ 

L<sub>eq</sub>, Tuesday, Feb 23





·

Figure 4: Noise Frequency Spectrum measured at ST (10-minute sample)



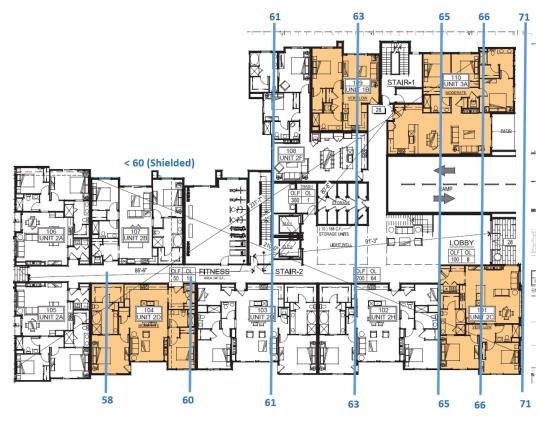


Figure 5A: Expected Future (2025) Day-Night Levels (Ldn) for Floor 1



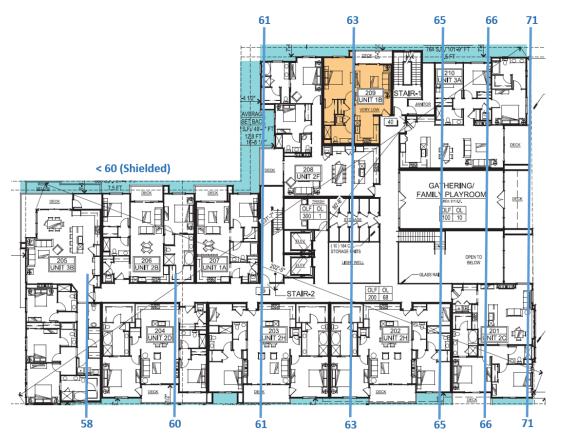


Figure5B: Expected Future (2025) Day-Night Levels (Ldn) for Floor 2



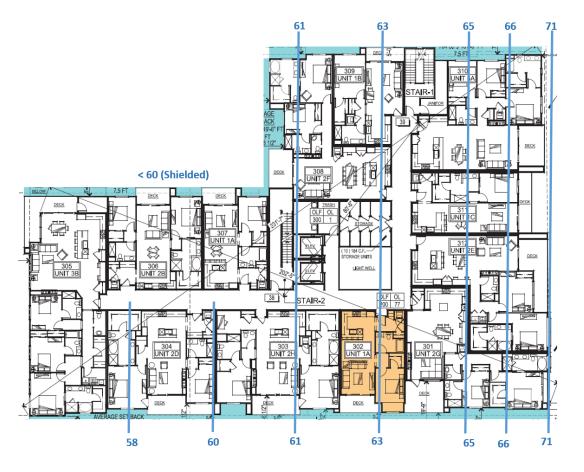


Figure 5C: Expected Future (2025) Day-Night Levels (Ldn) for Floors 3



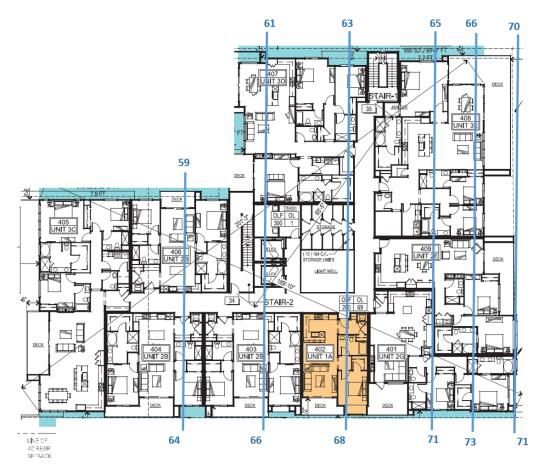
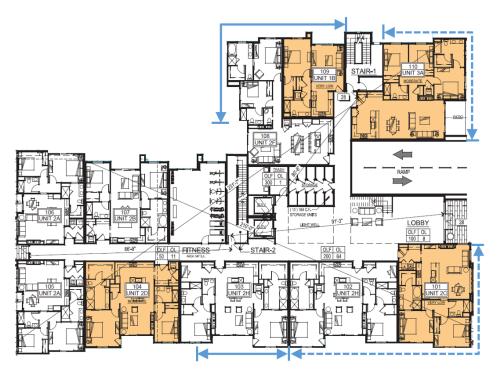


Figure 5D: Expected Future (2025) Day-Night Levels (Ldn) for Floors 4-5

Class I --OITC 24





WILSON IHRIG ACOUSTICS, NOISE & VIBRATION

Figure 6A: Minimum recommended glazing ratings for Floor 1
Windows and exterior doors not flagged require no acoustical rating





Figure 6B: Minimum recommended glazing ratings for Floor 2
Windows and exterior doors not flagged require no acoustical rating





Figure 6C: Minimum recommended glazing ratings for Floor 3
Windows and exterior doors not flagged require no acoustical rating



Figure 6D: Minimum recommended glazing ratings for Floor 4 and Floor 5
Windows and exterior doors not flagged require no acoustical rating



### Appendix A: Description of Acoustical Terms

### A-Weighted Sound Level (dBA):

The sound pressure level in decibels as measured on a sound level meter using the internationally standardized A-weighting filter or as computed from sound spectral data to which A-weighting adjustments have been made. A-weighting de-emphasizes the low and very high frequency components of the sound in a manner similar to the response of the average human ear. A-weighted sound levels correlate well with subjective reactions of people to noise and are universally used for community noise evaluations.

#### Airborne Sound:

Sound that travels through the air, as opposed to structure-borne sound.

### **Ambient Noise:**

The prevailing general noise existing at a location or in a space, which usually consists of a composite of sounds from many sources near and far.

#### **Community Noise Equivalent Level (CNEL):**

The  $L_{eq}$  of the A-weighted noise level over a 24-hour period with a 5 dB penalty applied to noise levels between 7 p.m. and 10 p.m. and a 10 dB penalty applied to noise levels between 10 p.m. and 7 a.m.

### **Day-Night Sound Level (Ldn):**

The  $L_{\text{eq}}$  of the A-weighted noise level over a 24-hour period with a 10 dB penalty applied to noise levels between 10 p.m. and 7 a.m.

#### Decibel (dB):

The decibel is a measure on a logarithmic scale of the magnitude of a particular quantity (such as sound pressure, sound power, sound intensity) with respect to a reference quantity.

#### **Energy Equivalent Level (Leq):**

The level of a steady noise which would have the same energy as the fluctuating noise level integrated over the time period of interest.  $L_{eq}$  is widely used as a single-number descriptor of environmental noise.  $L_{eq}$  is based on the logarithmic or energy summation and it places more emphasis on high noise level periods than does  $L_{50}$  or a straight arithmetic average of noise level over time. This energy average is not the same as the average sound pressure levels over the period of interest, but must be computed by a procedure involving summation or mathematical integration.

#### **Field Impact Insulation Class (FIIC):**

A single number rating similar to the IIC except that the impact sound pressure levels are measured in the field.



### **Field Sound Transmission Class (FSTC):**

A single number rating similar to STC, except that the transmission loss values used to derive the FSTC are measured in the field. All sound transmitted from the source room to the receiving room is assumed to be through the separating wall or floor-ceiling assembly.

### Frequency (Hz):

The number of oscillations per second of a periodic noise (or vibration) expressed in Hertz (abbreviated Hz). Frequency in Hertz is the same as cycles per second.

### **Impact Isolation Class (IIC):**

A single number rating used to compare the effectiveness of floor-ceiling assemblies in providing reduction of impact generated sounds such as footsteps. It is derived from the measurement of impact sound pressure levels across a series of 16 test bands using a standardized tapping machine.

#### **Noise Isolation Class (NIC):**

A single number rating derived from measured values of noise reduction between two enclosed spaces that are connected by one or more paths. The NIC is not adjusted or normalized to a standard reverberation time.

### **Normalized Noise Isolation Class (NNIC):**

A single number rating similar to the NIC, except that the measured noise reduction values are normalized to a reverberation time of 1/2 second.

### **Outdoor-Indoor Transmission Class (OITC):**

A single number classification, specified by the American Society for Testing and Materials (ASTM E 1332 issued 1994), that establishes the A-weighted sound level reduction provided by building facade components (walls, doors, windows, and combinations thereof), based upon a reference sound spectra that is typical of air, road, and rail transportation sources. The OITC is the preferred rating when exterior facade components are exposed to noise environments dominated by transportation sources.

### Octave Band - 1/3 Octave Band:

One octave is an interval between two sound frequencies that have a ratio of two. For example, the frequency range of 200 Hz to 400 Hz is one octave, as is the frequency range of 2000 Hz to 4000 Hz. An octave band is a frequency range that is one octave wide. A standard series of octaves is used in acoustics, and they are specified by their center frequencies. In acoustics, to increase resolution, the frequency content of a sound or vibration is often analyzed in terms of 1/3 octave bands, where each octave is divided into three 1/3 octave bands.

### Sound Absorption Coefficient (∀):

The absorption coefficient of a material is the ratio of the sound absorbed by the material to that absorbed by an equivalent area of open window. The absorption coefficient of a



perfectly absorbing surface would be 1.0 while that for concrete or marble slate is approximately 0.01 (a perfect reflector would have an absorption of 0.00).

### **Sound Pressure Level (SPL):**

The sound pressure level of sound in decibels is 20 times the logarithm to the base of 10 of the ratio of the RMS value of the sound pressure to the RMS value of a reference sound pressure. The standard reference sound pressure is 20 micro-pascals as indicated in ANSI S1.8-1969, "Preferred Reference Quantities for Acoustical Levels".

#### **Sound Transmission Class (STC):**

STC is a single number rating, specified by the American Society for Testing and Materials, which can be used to measure the sound insulation properties for comparing the sound transmission capability, in decibels, of interior building partitions for noise sources such as speech, radio, and television. It is used extensively for rating sound insulation characteristics of building materials and products.

#### **Structure-Borne Sound:**

Sound propagating through building structure. Rapidly fluctuating elastic waves in gypsum board, joists, studs, etc.

#### **Statistical Distribution Terms:**

 $L_{99}$  and  $L_{90}$  are descriptors of the typical minimum or "residual" background noise (or vibration) levels observed during a measurement period, normally made up of the summation of a large number of sound sources distant from the measurement position and not usually recognizable as individual noise sources. Generally, the prevalent source of this residual noise is distant street traffic.  $L_{90}$  and  $L_{99}$  are not strongly influenced by occasional local motor vehicle passbys. However, they can be influenced by stationary sources such as air conditioning equipment.

 $L_{50}$  represents a long-term statistical median noise level over the measurement period and does reveal the long-term influence of local traffic.

 $L_{10}$  describes typical or average levels for the maximum noise levels occurring, for example, during nearby passbys of trains, trucks, buses and automobiles, when there is relatively steady traffic. Thus, while  $L_{10}$  does not necessarily describe the typical maximum noise levels observed at a point, it is strongly influenced by the momentary maximum noise level occurring during vehicle passbys at most locations.

L<sub>1</sub>, the noise level exceeded for 1% of the time is representative of the occasional, isolated maximum or peak level which occurs in an area. L1 is usually strongly influenced by the maximum short-duration noise level events which occur during the measurement time period and are often determined by aircraft or large vehicle passbys.

# ATTACHMENT H

# Kielty Arborist Services LLC

Certified Arborist WE#0476A P.O. Box 6187 San Mateo, CA 94403 650-515-9783

April 30, 2018

Mohr Clock LLC 4856/4846 El Camino Real Los Altos, CA

Site: 4856 and 4846 El Camino Real, Los Altos, CA

Dear Mohr Clock LLC,

As requested on Tuesday, April 18, 2018, I visited the above sites to inspect and comment on the trees. New construction is planned for these sites and your concern as to the future health and safety of the trees has prompted this visit. The latest tentative maps including a grading plan and drainage plan, and a utility plan have been reviewed for this site. Tentative maps 1.0 through 3.0 dated March 5, 2018 were reviewed for this report.

#### **Method:**

All inspections were made from the ground; the trees were not climbed for this inspection. The trees in question were located on a "To-Scale" map provided by you. The trees were then measured for diameter at 54 inches above ground level (DBH or diameter at breast height). The trees were given a condition rating for form and vitality. The trees' condition rating is based on 50 percent vitality and 50 percent form, using the following scale.

- F- Very Poor
- **D-** Poor
- C- Fair
- **B-** Good
- A- Excellent

The height of the trees was measured using a Nikon Forestry 550 Hypsometer. The spread was paced off. Comments and recommendations for future maintenance are provided.

Survey:
---------

Tree#	Species Sycamore (Platanus acerifolia)	<b>DBH</b> 10.4	CON B		Comments Good vigor, fair form, good crotch formations.
2 <b>P/R</b>	Chinese pistache (Pistachia chinensis)	9.2	В	30/20	Good vigor, fair form, in restricted root area.
3 <b>P/R</b>	Sycamore (Platanus acerifolia)	8.9	C	35/30	Good vigor, fair form, trunk leans south, multi leader at 8 feet.
4 <b>P</b>	Redwood (Sequoia semperviren	31.2 us)	В	50/35	Good vigor, fair form, good screen.
5 <b>P</b>	Redwood (Sequoia semperviren	19.7 as)	В	50/35	Good vigor, fair form, good screen.
6 <b>P</b>	Redwood (Sequoia semperviren	21.3 us)	В	50/35	Good vigor, fair form, good screen.
7 <b>P</b>	Redwood (Sequoia semperviren	20.8 as)	В	50/35	Good vigor, fair form, good screen.
8 <b>P</b>	Redwood (Sequoia semperviren	21.2 as)	В	50/35	Good vigor, fair form, good screen.
9 <b>P</b>	Redwood (Sequoia semperviren	21.6 as)	В	50/35	Good vigor, fair form, good screen.
10 <b>P</b>	Redwood (Sequoia semperviren	22.0 as)	В	50/35	Good vigor, fair form, good screen.
11 <b>P</b>	Redwood (Sequoia semperviren	22est	В	50/35	Good vigor, fair form, good screen.
12 <b>P</b>	Redwood (Sequoia semperviren	28est	В	50/35	Good vigor, fair form, good screen.
13 <b>R</b>	Chinese pistache (Pistachia chinensis)	8.4	C	20/15	Good vigor, poor form, suppressed by redwoods.

P-Indicates protected tree by city ordinance R-Indicates tree proposed to be removed

### **Summary:**

The trees on site are a mix of imported trees (exotics), there are no trees native to this area of Los Altos on the site. The trees are in fair to good condition with no poor or excellent trees. The trees are all located on the perimeter of the property, ideal for construction. Trees #1-3 and #13 are proposed for removal.



The redwoods in the rear of the property provide a great screen and will be retained and protected for this project. The redwood trees are located in a landscaped area at the back of the property between the existing parking lot and property line. A concrete curb is between the asphalt parking lot and landscaped area. Because the rootable soil under the existing parking lot is highly compacted, root growth is expected to be minimal to nonexistent underneath the asphalt parking lot. It is likely that at least an 8 inch thick layer of compacted base rock sits below the parking lot.

Roots cannot grow in the highly compacted base rock area as there is not enough oxygen in the medium due to compacted conditions, and because water penetration into the soil is very limited. The concrete curb also helps to discourage root growth into the parking lot area. The concrete curb likely is extended at least 6 inches below the grade with another 6 inches of base rock underneath the curb. The curb and the base rock underneath the curb likely acted as a root barrier for these redwood trees, therefore little to no root growth is expected underneath the asphalt parking lot.

The majority of the proposed wood/paver patio is located outside of the existing landscaped area for the redwood trees. The patio sits at 24" below the existing parking lot grade. Because little to no root growth is expected outside of the landscaped area (under the existing parking lot), impacts to the majority of the existing redwood trees is expected to be nonexistent. Redwood trees #4-5 and #11-12 will be impacted as the existing landscaped area for these trees is to be reduced by the proposed retaining wall around the proposed wood/paver patio. The excavation for the retaining wall will be at a distance of 8 feet from these trees. The Project Arborist must be called out to the site to witness the excavation for the retaining wall near these trees. The excavation must be done by hand in order to cleanly cut roots where needed. Any roots or root ends to be exposed for longer than 4 hours must be wrapped in burlap and kept moist by spraying down the burlap multiple times a day with clean water. Impacts will be mitigated through heavy irrigation as well as a deep water fertilization to tree trees root zones before the start of the project.



Showing redwood trees #11-12 with larger landscaped area

The majority of the proposed underground parking garage is located underneath the existing parking lot where no roots are expected. Stitch piers must be used for the construction of the parking garage as using the standard OSHA overcut for basement excavation would likely impact the trees as excavation would need to encroach into the existing landscaped area between the existing parking lot and redwood trees. Again redwood trees #4-5 and #11-12 will be impacted as they have a larger landscaped area then the rest of the trees where roots will have grown into. Because the wood/paver patio is closer to the trees than the parking garage and because the patio will be 24" underneath the existing grade, any roots growing in the landscaped area for trees #4-5 and #11-12 will be severed by the retaining wall surrounding the proposed deck in closer proximity to these trees than the underground parking garage.



### Evidence of a parking lot and curb surrounding parking lot discouraging root growth

We have seen this same type of root barrier for a redwood tree on a similar project in San Mateo where there was a small landscaped area with a large 40 inch redwood tree adjacent to a parking lot with a curb. Little to no roots were found underneath the parking lot when excavation was completed. A large amount of roots were seen in the existing landscaped area.

Showing picture from another job with a redwood tree located in a landscaped area adjacent to an existing asphalt parking lot with a curb. Little to no roots were found underneath the asphalt parking lot as the curb and compacted base rock below the parking lot discouraged root growth.

### Mitigations/recommendations for redwood tree health.

Redwood trees are not native to this area of Los Altos. This area of Los Altos is an oak woodland habitat and is significantly drier than the redwood trees native habitat. Therefore, significant irrigation must be provided to the redwood trees to be able to maintain a healthy canopy. The following recommendations for the redwood trees will also act as mitigation measures for any minor root loss.

- Significant irrigation shall be provided to the redwood trees within the landscaped area. Soaker hoses shall be placed throughout the landscaped area. Soaker hoses shall be turned on every 2 weeks during the dry season until the top foot of soil is saturated. Redwood trees in this area require significant irrigation to maintain a healthy canopy as they are out of their native range. Soil shall be allowed to dry out between watering.
- The project arborist must be on site during any of the proposed excavation near the redwood trees. Any encountered roots (expected to be minimal to non existent) will need to be cleanly cut under the project arborist supervision. Root ends, if left exposed, shall be wrapped in burlap and kept moist by spraying down the burlap with clean water multiple times a day.
- During the month of either May or June the trees should be deep water fertilized by a licensed tree care provider capable of injecting at least 400 gallons of water into the ground mixed with a well balanced fertilizer.

The existing street trees are proposed to be removed. Replacement street trees will need to be provided. The following tree protection plan should help to reduce impacts to the retained trees.

### **Tree Protection Plan:**

Tree protection zones should be installed and maintained throughout the entire length of the project. Fencing for tree protection should be 6' tall, metal chain link material supported by metal 2" diameter poles, pounded into the ground to a depth of no less than 2'. The location for the protective fencing should be placed in a way that completely fences off the entire landscaped area that the redwood trees are located in. No materials shall be stored or cleaned inside the protection zones.

### **Demolition and Staging**

Prior to the start of the demolition process, all tree protection measures must be in place. An inspection prior to the start of the demolition may be required. All vehicles must remain on paved surfaces if possible. The removal of existing hardscapes in close proximity to the redwood trees should be carried out with care. Hand excavation will be required in case areas of heavy rooting are exposed. Exposed or damaged roots should be repaired and covered with native soil. Tree protection fencing may need to be moved after the demolition. The site arborist should be notified and the relocated fence should be inspected.

### Root Cutting

Any roots to be cut shall be monitored and documented. Large roots (over 2" diameter) or large masses of roots to be cut must be inspected by the site arborist prior to being cut. The site arborist, at this time, may recommend irrigation or fertilization of the root zone. All roots needing to be cut should be cut clean with a saw or lopper and painted with latex paint. Roots to be left exposed for a period of time should be covered with layers of burlap and kept moist.

### Trenching

Trenching for irrigation, drainage, electrical or any other reason shall be done by hand when inside the dripline of a protected tree. Hand digging and the careful placement of pipes below or besides protected roots will significantly reduce root loss, thus reducing trauma to the tree. All trenches shall be backfilled with native materials and compacted to near its original level, as soon as possible. Trenches to be left open for a period of time (24 hours), will require the covering of all exposed roots with burlap and be kept moist. The trenches will also need to be covered with plywood to help protect the exposed roots.

### Irrigation

Normal irrigation shall be maintained on this site at all times. During the warm season, April – November, I typically recommend some additional heavy irrigation, 2 times per month. During the winter months, it may be necessary to irrigate 1 additional time per month. Seasonal rainfall may reduce the need for additional irrigation.

### Inspections

The City of Los Altos does not require monthly tree inspections on construction sites of this nature. An inspection of the tree protection measures is often required prior to the start of demolition. The inspections must be carried out by the site arborist. Other visits will be on an "as needed" basis. The site arborist shall be on site during the excavation process.

The information included in this report is believed to be true and based on sound arboricultural principles and practices.

Sincerely,

Kevin R. Kielty Certified Arborist WE#0476A



# ATTACHMENT I

2001 Gateway Place, Suite 101E San Jose, California 95110 (408)501-7864 svlg.org

> CARL GUARDINO President & CEO

Board Officers:
STEVE MILLIGAN. Chair
Western Digital Corporation
JAMES GUTIERREZ, Vice Chair
Insiki
RAQUEL GONZALEZ, Treasure
Bank of America
GREG BECKER, Former Chair
SVB Financial Group

STEVE BERGLUND, Former Chair Trimble Inc. AART DE GEUS, Former Chair Synopsys TOM WERNER, Former Chair SunPower

Board Members:
BOBBY BELL
KLA-Tencor
DAWNET BEVERLEY
Donnelley Financial Solutions
GEORGE BLUMENTHAL
University of California, Santa Cruz
JOHN BOLAND
KQED
CARLA BDRAGNO

KOED
CARLA BORAGNO
Genentech
CHRIS BOYD
Kaiser Permanente
JOE BURTON
Plantronics
RAMI BRANITZKY
Sapphire Ventures
GARY BRIGGS
Facebook
KEVIN COLLINS
ACANITEL
LISA DAMIELS

KPMG CHRISTOPHER DAWES Lucile Packard Children's Hospital Stanford JENNY DEARBORN SAP MICHAEL ENGH, S.J.

MICHAEL ENGH, S.J.
Santa Clara University
TOM FALLON
Infinera
JOHN GAUDER
Comcast
KEN GOLDMAN
Hillspire
DOUG GRAHAM
Lockheed Martin
LAURA GUIO
IBM
STEFAN HECK
Nauto
ERIC HOUSER
Wells Fargo Bauk
AIDAN HUGHES

ARUP
JEFFREY JOHNSON
San Francisco Chronicle
TOM KEMP
Centrify
AARIF KHAKOO
AMGEN
ERIC KUTCHER
McKinsey & Company
JOHN LEDEK

BD Biosciences
ENRIQUE LORES
ENRIQUE LORES
MATT MAHAM
Brigade
TARKAN MANER
Nexenta
KEN MCNEELY
AT&T
BEN MINICUCCI
Alaska Airlines
KEVIN MURAI
Synnex
MARY PAPAZIAN

Synnex
MARY PAPAZIAN
an Jose State University
JES PEDERSEM
Weboor Builders
ANDY PIERCE
Stryker Endoscopy
KIM POLESE
ClearStreet
RYAN POPPLE
Proterra
RUDY REYES
Verizon
BILL RUH

SHARON RYAN
Bay Area News Group
RON SEGE
Echelon
DARREN SNELL GROVE
Johnson & Johnson
JEFF THOMAS
Nasdaq
JED YORK
San Francisco 49ers

Established in 1978 by David Packard August 17, 2018

Chair Phoebe Bressack and Members of the Planning Commission City of Los Altos 1 North San Antonio Road Los Altos, CA 94022

RE: September 6, 2018 Planning Commission Meeting
Altos One Residential Development, 4846-4856 El Camino Real

Dear Chair Bressack and Honorable Members of the Planning Commission,

On behalf of the Silicon Valley Leadership Group, I express our support for the proposed 50 for-sale condominiums of the Altos One residential development. Appropriately high-density housing along the transit-rich El Camino Real is exactly where we should be building housing that leverages the significant investment in our transportation systems and transit corridors.

The Silicon Valley Leadership Group, founded in 1978 by David Packard of Hewlett-Packard, represents more than 375 of Silicon Valley's most respected employers on issues, programs and campaigns that affect the economic quality of life in Silicon Valley.

California and especially the Bay Area are currently experiencing a grave housing shortage that deeply threatens our innovation economy. Our companies are struggling to attract and keep employees at all levels because of the cost of housing. We need to construct more homes of all types and for all Californians so that our region, our workers, and their families can prosper and thrive.

We applaud the City of Los Altos for doing its part to provide homes and to continue building new housing. Because of the height and density of this development, we encourage the developer to work closely with the surrounding community and building owners to respond to any concerns without the loss of any of the proposed housing amount. We are excited for this high-density project that should be developed in partnership with the community in the hopes that this is not the last high-density development along El Camino Real.

The Leadership Group is committed to increasing the housing supply in our Valley and Bay Area, and we proudly support proposed residential developments like the one before you.

Sincerely,

Carl Guardino President & CEO

Silicon Valley Leadership Group

and Huarduro



2001 Gateway Place, Suite 101E ian Jose, California 95110 (408)501-7864 svlg.org

CARL GUARDINO

Board Officers: STEVE MILLIGAN, Chair Western Digital Corporation JAMES GUTIERREZ, Vice Chair

RAQUEL GONZALEZ Treasure Bank of America GREG BECKER, Former Chair SVB Financial Group STEVE BERGLUND, Former Chair Trimble Inc AART DE GEUS, Former Chair Synopsys TOM WERNER, Former Chair SunPower

BOBBY BELL KLA-Tencor DAWNET BEVERLEY Donnelley Financial Solutions GEORGE BLUMENTHAL University of California, Santa Cruz JOHN BOLAND KQED CARLA BORAGNO Genentech CHRIS BOYD Plantronics RAMI BRANITZKY Sapphire Ventures GARY BRIGGS Facebook KEVIN COLLINS Accenture LISA DANIELS

> Lucile Packard Children's Hospital Stanford JENNY DEARBORN SAP MICHAEL ENGH, S.J. TOM FALLON Infinera JOHN GAUDER Comcast KEN GOLDMAN Hillspire DOUG GRAHAM LAURA GUIO STEFAN HECK

CHRISTOPHER DAWES

Nauto ERIC HOUSER Wells Fargo Bank AIDAN HUGHES JEFFREY JOHNSON San Francisco Chronicle TOM KEMP Centrify AARIF KHAKOO AMGEN ERIC KUTCHER BD Biosciences ENRIQUE LORES MATT MAHAN Brigade TARKAN MANER

Nexenta KEN MCNEELY AT&T BEN MINICUCCI Alaska Airlines KEVIN MURAI Synnex MARY PAPAZIAN JES PEDERSEN Vebcor Builders ANDY PIERCE Stryker Endoscopy KIM POLESE RYAN POPPLE Proterra RUDY REYES

RILL RUH SHARON RYAN Bay Area News Group RON SEGE DARREN SNELL GROVE Johnson & Johnson JEFF THOMAS Nasdaq JED YORK September 24, 2018

Mayor Jean Mordo and Honorable Councilmembers City of Los Altos 1 North San Antonio Road Los Altos, CA 94022

### RE: Support for Altos One Residential Development, 4846-4856 El Camino Real

Dear Mayor Mordo, Vice Mayor Lee Eng, and Honorable Councilmembers,

On behalf of the Silicon Valley Leadership Group, I express our support for the proposed 50 for-sale condominiums of the Altos One residential development. Appropriately high-density housing along the transit-rich El Camino Real is exactly where we should be building housing that leverages the significant investment in our transportation systems and transit corridors.

The Silicon Valley Leadership Group, founded in 1978 by David Packard of Hewlett-Packard, represents more than 375 of Silicon Valley's most respected employers on issues, programs and campaigns that affect the economic quality of life in Silicon Valley.

California and especially the Bay Area are currently experiencing a grave housing shortage that deeply threatens our innovation economy. Our companies are struggling to attract and keep employees at all levels because of the cost of housing. We need to construct more homes of all types and for all Californians so that our region, our workers, and their families can prosper and thrive.

We applaud the City of Los Altos for doing its part to provide homes and to continue building new housing. Because of the height and density of this development, we encourage the developer to work closely with the surrounding community and building owners to respond to any concerns without the loss of any of the proposed housing amount. We are excited for this high-density project that should be developed in partnership with the community in the hopes that this is not the last high-density development along El Camino Real.

The Leadership Group is committed to increasing the housing supply in our Valley and Bay Area, and we proudly support proposed residential developments like the one before you.

Sincerely,

Carl Guardino President & CEO

Silicon Valley Leadership Group

al Huarduro

San Francisco 49ers



### PROJECT DIRECTORY

**OWNER** LUXONE LLC 572 CHIMALUS DR. PALO ALTO, CA 94306 PHONE: (650) 996-1114 EMAIL: MIRCEA@ALTOSONE.COM

ARCHITECT

CONTACT: JEFF POTTS SDG ARCHITECTS INC. 3361 WALNUT BLVD. SUITE 120 BRENTWOOD, CA 94513 PHONE: (925) 634-7000 EMAIL JPOTTS@STRAUSSDESIGN.COM

CIVIL ENGINEER

CONTACT: PETER CARLINO LEA & BRAZE ENGINEERING, INC 2495 INDUSTRIAL PARKWAY WEST HAYWARD, CA 94545 PHONE: (510) 887-4086 EMAIL: PCARLINO@LEABRAZE.COM

LANDSCAPE ARCHITECT

CONTACT: SCOTT E. FEUER ENVIRONMENTAL FORESIGHT, INC. 1700 N. BROADWAY, SUITE 401 WALNUT CREEK, CA 94596 PHONE: (925) 945-0300

EMAIL: SFEUER@ENVIRONMENTALFORESIGHT.COM



CITY COUNCIL ADDENDUM

TITLE SHEET

T1 T2 T3

A42

L-1

L-2 L-3 TM-1.0

TM-1\_1

TM-2.0

TM-3.0

TM-3.1

SU1

SU1 EX-T

LUXONE LLC

ALTOS ONE 4846 & 4856 El Camino Real

Los Altos, CA

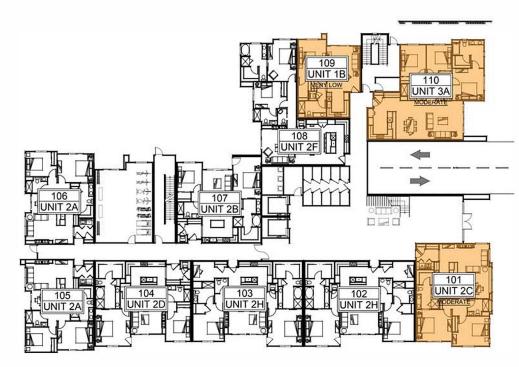
October 15, 2018

572 Chimalus Dr. Palo Alto, CA 94306









FIRST FLOOR

### **BELOW MARKET RATE UNITS**

FIRST FLOOR:

UNIT 101 - MODERATE: TYPE 2C = +/-1308 SF 2 BEDROOM / 2 BATHROOM UNIT 109 - VERY LOW: TYPE 1B = +/-785 SF

UNIT 110 - MODERATE: 1 BEDRROOM / 1 BATHROOM TYPE 3A = +/-1569 SF 3 BEDROOM / 2 BATHROOM

SECOND FLOOR:

UNIT 206 - VERY LOW: TYPE 1A = +/-782 SF

1 BEDROOM / 1 BATHROOM UNIT 209 - VERY LOW: TYPE 1B = +/-785 SF

1 BEDRROOM / 1 BATHROOM

THIRD FLOOR: UNIT 302 - VERY LOW:

TYPE 1A = +/-782 SF 1 BEDROOM / 1 BATHROOM

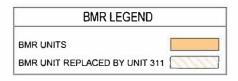
UNIT 311 - VERY LOW:

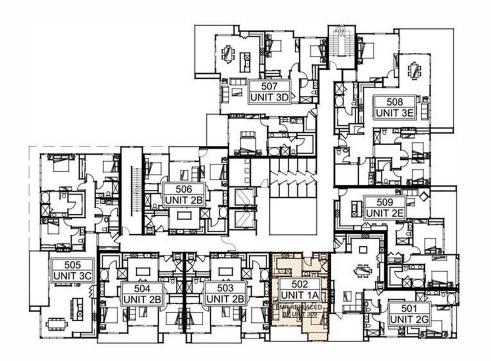
TYPE 1C = +/-902 SF 1 BEDRROOM / 1 BATHROOM

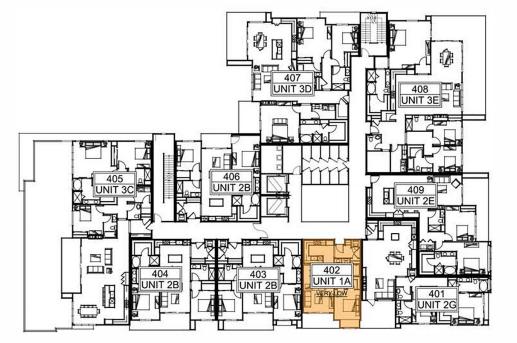
FOURTH FLOOR:

UNIT 402 - VERY LOW:

TYPE 1A = +/-782 SF 1 BEDROOM / 1 BATHROOM







FIFTH FLOOR

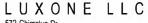
**FOURTH FLOOR** 



SDG Architects, Inc.

ALTOS ONE

4846 & 4856 El Camino Real Los Altos, CA October 15, 2018





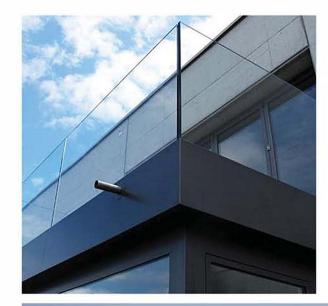


**EQUITONE: TECTIVA** 





DOORS AND WINDOWS: METAL WINDOW CORPORATION





DECK MOUNTED GLASS GAURD RAILINGS





SIDING: KEBONY CLEAN 90° SHIPLAP CLADDING





CENTRIA ARCHITECTURAL METAL PANELS RUST FINISH

PROJECT MATERIALS

SDG Architects, Inc.

A L T O S O N E 4846 & 4856 El Camino Real Los Altos, CA October 15, 2018



FRONT ELEVATION

RIGHT ELEVATION



REAR ELEVATION



LEFT ELEVATION

INDICATES RECESSED WINDOW

A L T O S O N E 4846 & 4856 El Camino Real Los Altos, CA October 15, 2018

> 3361 Walnut Blvd. Suite 120 Brentwood, CA 94513 925.634.7000 www.straussdesign.com SDG Architects, Inc.





4846 & 4856 El Camino Rea Los Altos, CA October 15, 2018



SDG Architects, Inc.





Los Altos, CA October 15, 2018



RIGHT ELEVATION





Los Altos, CA October 15, 2018









Los Altos, CA October 15, 2018







VIEW FROM EL CAMINO REAL

A L T O S O N E 4846 & 4856 El Camino Real Los Altos, CA October 15, 2018

BUILDING PERSPECTIVE



VIEW FROM CORNER OF EL CAMINO REAL / SHOWERS DRIVE

A L T O S O N E 4846 & 4856 El Camino Real Los Altos, CA October 15, 2018

BUILDING PERSPECTIVE



PEDESTRIAN VIEW FROM EL CAMINO REAL



VIEW FROM 2ND STORY WINDOW OF APARTMENTS TO THE REAR w/o SCREEN TREES

A L T O S O N E Los Altos, CA October 15, 2018

VIGNETTE PERSPECTIVES



SOUTH PERSPECTIVE



NORTH PERSPECTIVE



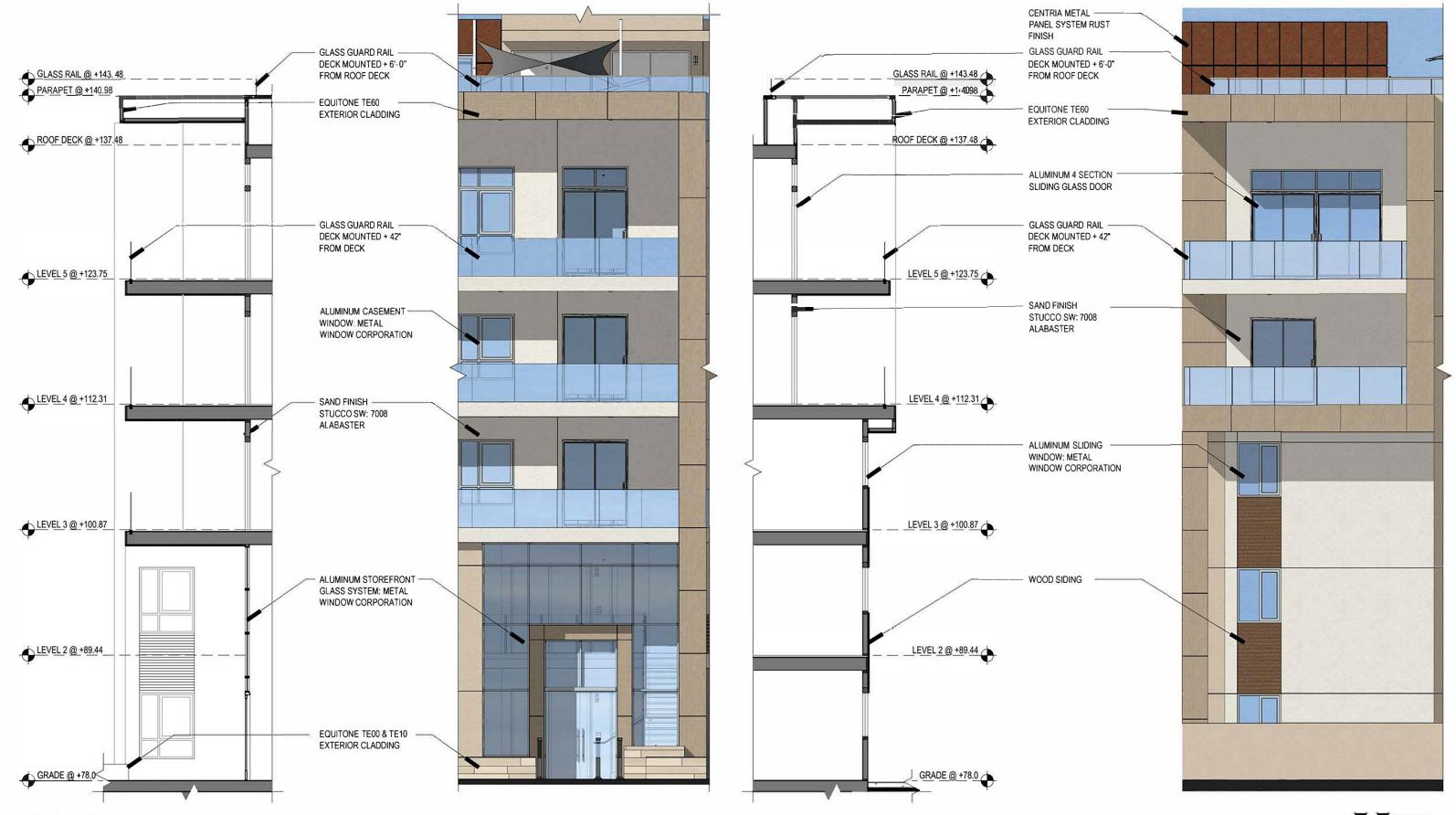
WEST PERSPECTIVE



EAST PERSPECTIVE

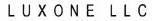
A L T O S O N E 4846 & 4856 El Camino Real Los Altos, CA October 15, 2018

BUILDING PERSPECTIVES



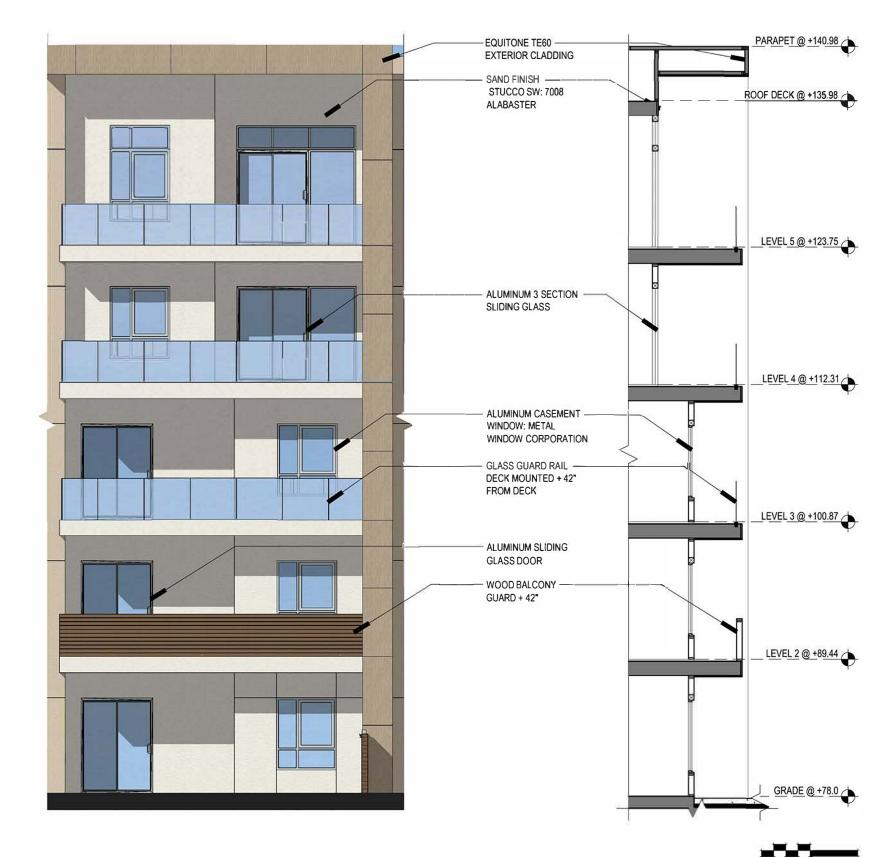
A L T O S O N E 4846 & 4856 El Camino Real

Los Altos, CA October 15, 2018 A40 WALL SECTIONS & DETAILS



572 Chimalus Dr. Palo Alto, CA 94306 3361 Walnut Blvd. Suite 120 Brentwood, CA 94513 925.634.7000 www.straussdesign.com





A L T O S O N E 4846 & 4856 El Camino Real

Los Altos, CA October 15, 2018

L U X O N E L L C 572 Chimalus Dr. Palo Alto, CA 94306

WALL SECTIONS & DETAILS



## PROJECT DIRECTORY

OWNER LUXONE LLC 572 CHIMALUS DR. PALO ALTO, CA 94306 PHONE: (650) 996-1114 EMAIL: MIRCEA@ALTOSONE.COM

ARCHITECT

CONTACT: JEFF POTTS SDG ARCHITECTS INC. 3361 WALNUT BLVD. SUITE 120 BRENTWOOD, CA 94513 PHONE: (925) 634-7000 EMAIL: JPOTTS@STRAUSSDESIGN.COM

CIVIL ENGINEER

CONTACT : PETER CARLINO LEA & BRAZE ENGINEERING, INC 2495 INDUSTRIAL PARKWAY WEST HAYWARD, CA 94545 PHONE: (510) 887-4086 EMAIL: PCARLINO@LEABRAZE.COM

LANDSCAPE ARCHITECT

CONTACT : SCOTT E. FEUER ENVIRONMENTAL FORESIGHT, INC. 1700 N. BROADWAY, SUITE 401 WALNUT CREEK, CA 94596

PHONE: (925) 945-0300 EMAIL: SFEUER@ENVIRONMENTALFORESIGHT.COM



## **DRAWINGINDEX**

IIILE SHEET	
PROJECT DATA SHEET	T
CONTEXT - LOS ALTOS MULTI-FAMILY	A0
CONTEXT - 4846 & 4856 EL CAMINO REAL VICINITY	A02
CONTEXT - SITE PHOTOS	A03
CONTEXT - SAMPLE DETAILS	A04
LOWER LEVEL BASEMENT FLOOR PLAN	A
UPPER LEVEL BASEMENT FLOOR PLAN	Α
ARCHITECTURAL SITE PLAN	A2.
FIRST FLOOR PLAN	A2.2
SECOND FLOOR PLAN	A
THIRD FLOOR PLAN	A
FOURTH FLOOR PLAN	AS
FIFTH FLOOR PLAN	A
ROOF PLAN	A
FRONT ELEVATION	A8
RIGHT ELEVATION	A
REAR ELEVATION	A10
LEFT ELEVATION	A1
BUILDING SECTION A	A12
BUILDING SECTION B	A13
ELEVATOR SECTIONS	A14
ELEVATOR CUT SHEET	A15
UNIT 1A FLOOR PLAN	A16
UNIT 18 FLOOR PLAN	A17
UNIT 1C FLOOR PLAN	A18
UNIT 2A ALT FLOOR PLAN	A19
UNIT2B FLOOR PLAN	A20
UNIT 2C FLOOR PLAN	A2
UNIT 2D FLOOR PLAN	A22
UNIT 2E FLOOR PLAN	A23
UNIT 2F FLOOR PLAN	A24
UNIT 2G FLOOR PLAN	A25
UNIT 2H FLOOR PLAN	A26
UNIT 3A FLOOR PLAN	A2
UNIT 3B FLOOR PLAN	A28
UNIT 3C FLOOR PLAN	A29
UNIT 3D FLOOR PLAN	A30
UNIT 3E FLOOR PLAN	A3
BUILDING PERSPECTIVE	A32
BUILDING PERSPECTIVE	A3:
BUILDING PERSPECTIVE	A34
VIGNETTE PERSPECTIVES	A35
BUILDING PERSPECTIVES	A36
SHADOW STUDY	A3
SHADOW STUDY	A38
OPEN SPACE	A39
WALL SECTIONS & DETAILS	A40
WALL SECTIONS & DETAILS	A4
WALL SECTIONS & DETAILS	A42
GROUND FLOOR PRELIMINARY LANDSCAPE PLAN	
	L-
ROOF DECK PRELIMINARY LANDSCAPE PLAN	L-2 L-3
LANDSCAPING DESIGN IMAGES	
TITLE SHEET	TM-1.0
TENTATIVE PARCEL MAP	TM-1.
GRADING AND DRAINAGE PLAN	TM-2.0
STORMWATER CONTROL & UTILITY PLAN	TM-3.0
STORMWATER CONTROL DETAILS	TM-3.
4856 TOPOGRAPHIC SURVEY	SU
4846 TOPOGRAPHIC SURVEY	SU
TREE NUMBER EXHIBIT	EX-
PRELIMINARY CONSTRUCTION MANAGEMENT PLAN	CMP
PRELIMINARY CONSTRUCTION MANAGEMENT PLAN	

A L T O S O N E 4846 & 4856 El Camino Real

Los Altos, CA July 18, 2018



572 Chimalus Dr. Palo Alto, CA 94306



## UNIT AREA SUMMARY

		NUMBER OF	TOTAL SQ FT. OF	UNIT MAKEUP		occ.	TOTAL
UNIT	FOOTAGE	UNITS IN BUILDING	UNITS IN BUILDING	BEDROOMS	BATHS	LOAD PER UNIT	OCC. LOAD
1A	782	5	3,910	1	1.0	3.91	19.55
1B	785	3	2,355	1	1.0	3.93	11.78
1C	902	1	902	1	1.0	4.51	4.51
2A	1081	2	2,162	2	2.0	5.41	10.81
2B	1169	9	10,521	2	2.0	5.85	52.61
2C	1308	2	2,616	2	2.0	6.54	13.08
2D	1353	3	4,059	2	2.0	6.77	20.30
2E	1430	3	4,290	2	2.0	7.15	21.45
2F	1407	3	4,221	2	2.0	7.04	21.11
2G	1451	3	4,353	2	2.5	7.26	21.77
2H	1546	5	7,730	2	2.5	7.73	38.65
3A	1569	3	4,707	3	2.0	7.85	23.54
3B	2053	2	4,106	3	3.5	10.27	20.53
3C	2159	2	4,318	3	3.5	10.80	21.59
3D	2140	2	4,280	3	3.5	10.70	21.40
3E	2302	2	4,604	3	3.5	11.51	23.02
FITNESS	791	1	791	0	0.0	3.96	3.96
FAMILY/GATHERING	911	1	911	0	0.0	4.56	4.56
TOTAL BUILDING		50	70,836	1			354.18

## AFFORDABLE HOUSING / DENSITY BONUS\_

#### AFFORDABLE HOUSING

• LOT SIZE: 31,576 / 43560 = .72 AC

ALLOWABLE DENSITY: .725 AC x 38 DU/AC = 27.55 = 28 UNITS

AFFORDABLE HOUSING PER LAMC

28 UNITS x 10% BMR = 2.8 = 3 BMR

#### DENSITY BONUS

• AFFORDABLE UNITS = 8 UNITS

2 MODERATE / 6 VERY LOW

6 VERY LOW / 28 = 21.4 % = 75.25 % DENSITY BONUS

28 UNITS X 75.25 % = 50 UNITS

ACTUAL DENSITY = 69.4 DU/AC

PROPOSED BUILDING CONFIGURATION

(4) 1 BEDROOM UNITS 600 SF - 800 SF

(28) 2 BEDROOM UNITS 1100 SF - 1600 SF

(10) 3 BEDROOM UNITS 1700 SF - 2150 SF

PROPOSED BMR UNITS

(6) 1 BEDROOM VERY LOW INCOME

(1) 2 BEDROOM MODERATE INCOME

(1) 3 BEDROOM MODERATE INCOME

## INCENTIVES (15% VERY LOW = 3 INCENTIVES)

	STANDARD	REQUESTED
1. REAR YARD SETBACK DECREASE BY 20% (4th AND 5th FLOORS ONLY)	100'	60'
2. REAR YARD SETBACK DECREASE BY ADDITIONAL 20 % (4th AND 5th FLOORS ONLY)	100'	60'
3. HEIGHT INCREASE		
FRONT PORTION OF BUILDING INCLUDING INCREASED SETBACK AREA	45'	58'
REAR PORTION OF BUILDING OUTSIDE INCREASED SETBACK AREA	30'	35'

## WAIVERS

1. ELEVATOR TOWER HEIGHT INCREASE	12'	17'-10.75"
2. 118 SF ROOF STRUCTURE INCREASE*	(4%) 824 SF	(4.6%) 942 SF

## \*INCLUDES ELEVATORS, STAIRS, AND TRASH ENCLOSURE

## PARKING STANDARDS

• PARKING STANDARDS (PER LAMC 14.28.040 SECTION G2a)

REQUIRED SPACES

1 SPACE PER 1 BEDROOM UNIT: 9 SPACES 2 SPACES PER 2+ BEDROOM UNIT: 82 SPACES TOTAL REQUIRED: 91 SPACES

INCLUDES GUEST AND HANDICAPPED SPACES

PARKING PROVIDED

TANDEM SPACES: 40 SPACES
STANDARD SPACES: 65 SPACES
ADA SPACES: 3 SPACES
TOTAL PROVIDED: 108 SPACES

## PROJECT DATA SUMMARY

ADDRESS: 4846 & 4856 EL CAMINO REAL LOS ALTOS, CA 94022

ZONING: COMMERCIAL THOROUGHFARE (CT) SITE AREA: 31,576 S.F. ( .725 ACRES )

OCCUPANCY: S2 / R2 CONSTRUCTION TYPE: IA / IIIA

RESIDENTIAL UNITS: 50 UNITS ACTUAL DENSITY: 68.96 DU/AC

**UNIT SUMMARY** 

(9) 1 BEDROOM UNITS

(30) 2 BEDROOM UNITS

(11) 3 BEDROOM UNITS

## **BUILDING AREA SUMMARY**

LOWED DACEMENT ELOOD.	0E 400 C E
LOWER BASEMENT FLOOR:	20,420 S.F.
UPPER BASEMENT FLOOR:	25,428 S.F.
FIRST FLOOR:	18,055 S.F.
SECOND FLOOR:	18,721 S.F.
THIRD FLOOR:	18,623 S.F.
FOURTH FLOOR:	16,760 S.F.
FIFTH FLOOR:	16,760 S.F.

TOTAL LIVING: 88,919 S.F. GARAGE: 50,856 S.F.

A L T O S O N E 4846 & 4856 El Camino Real Los Altos, CA

July 18, 2018









86 THIRD STREET 100 FIRST STREET





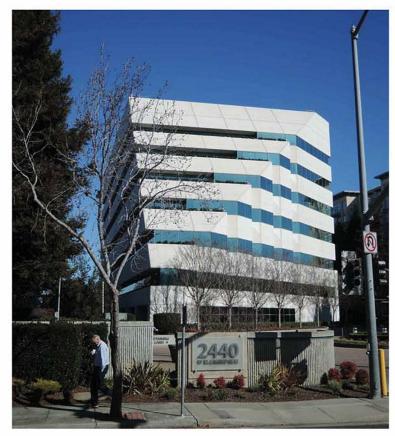


960 NORTH SAN ANTONIO ROAD 4750 EL CAMINO REAL

A L T O S O N E 4846 & 4856 El Camino Real Los Altos, CA July 18, 2018

LOS ALTOS MULTI-FAMILY

A-01 CONTEXT



2440 EL CAMINO REAL





2400EL CAMINO REAL



4880 EL CAMINO REAL



JACK-IN-THE-BOX

2350 EL CAMINO REAL

4846 & 4856 EL CAMINO REAL VICINITY

A L T O S O N E 4846 & 4856 El Camino Real Los Altos, CA July 18, 2018

A-02

CONTEXT







EL CAMINO VIEW FROM NORTHEAST

EL CAMINO VIEW

VIEW FROM ACROSS EL CAMINO







VIEW TOWARDS REAR PROPERTY LINE

VIEW TOWARDS REAR PROPERTY LINE

VIEW FROM REAR PROPERTY LINE







VIEW FROM WEST (SEE'S CANDIES)

VIEW FROM SOUTHEAST (JACK-IN-THE-BOX)

SITE PHOTOS

VIEW FROM EAST PROPERTY LINE

A L T O S O N E 4846 & 4856 El Camino Real Los Altos, CA July 18, 2018

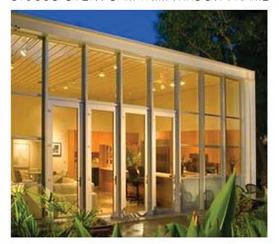
A-03 CONTEXT

SDG Architects, Inc.

L U X O N E L L C 572 Chimalus Dr. Palo Alto, CA 94306



STUCCO OVER FOAM TRIM WINDOW FRAME





DOORS AND WINDOWS: METAL WINDOW CORPORATION





DECK MOUNTED GLASS GAURD RAILINGS





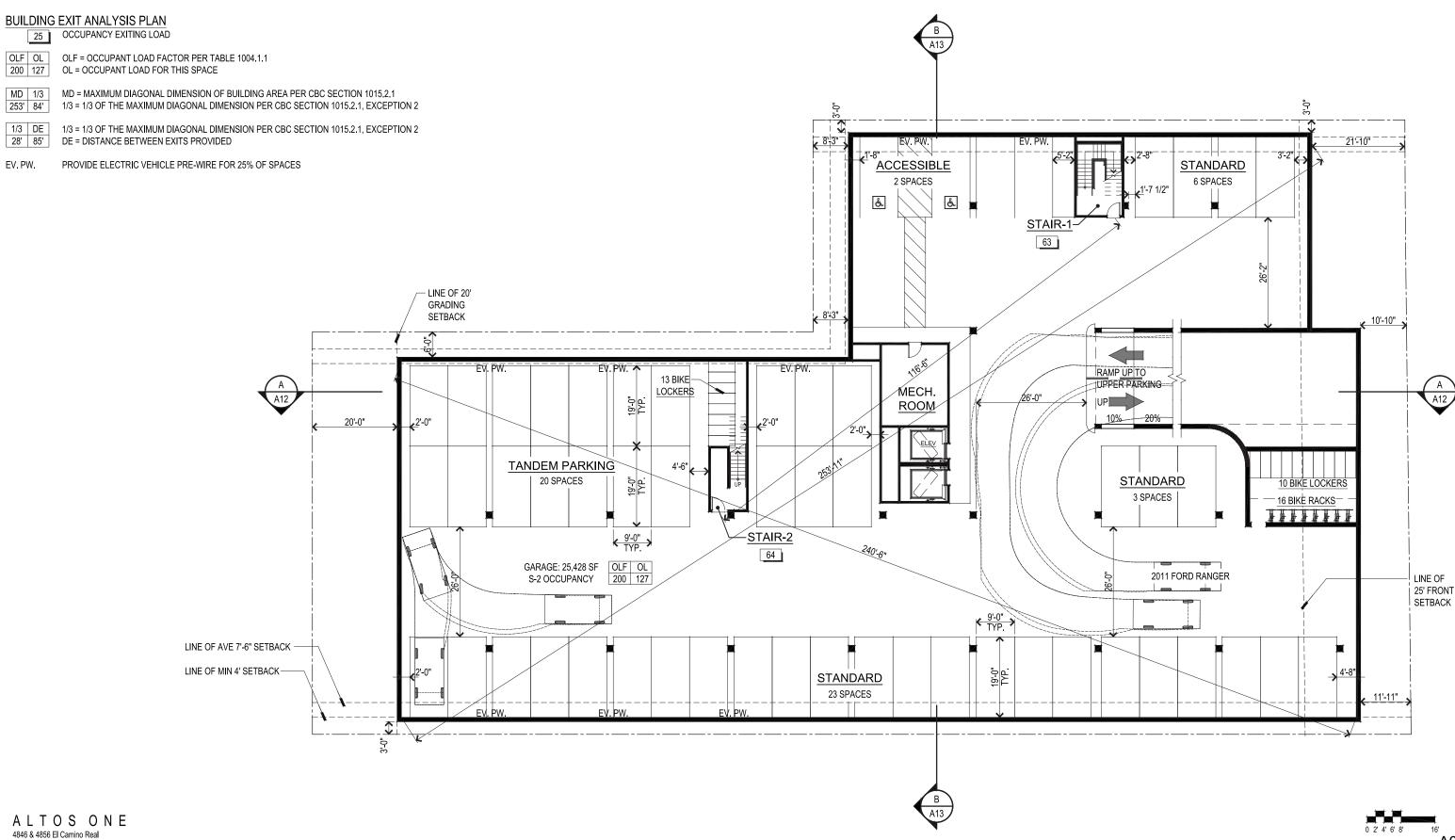
SIDING: KEBONY CLEAN 90° SHIPLAP CLADDING





CENTRIA ARCHITECTURAL METAL PANELS RUST FINISH

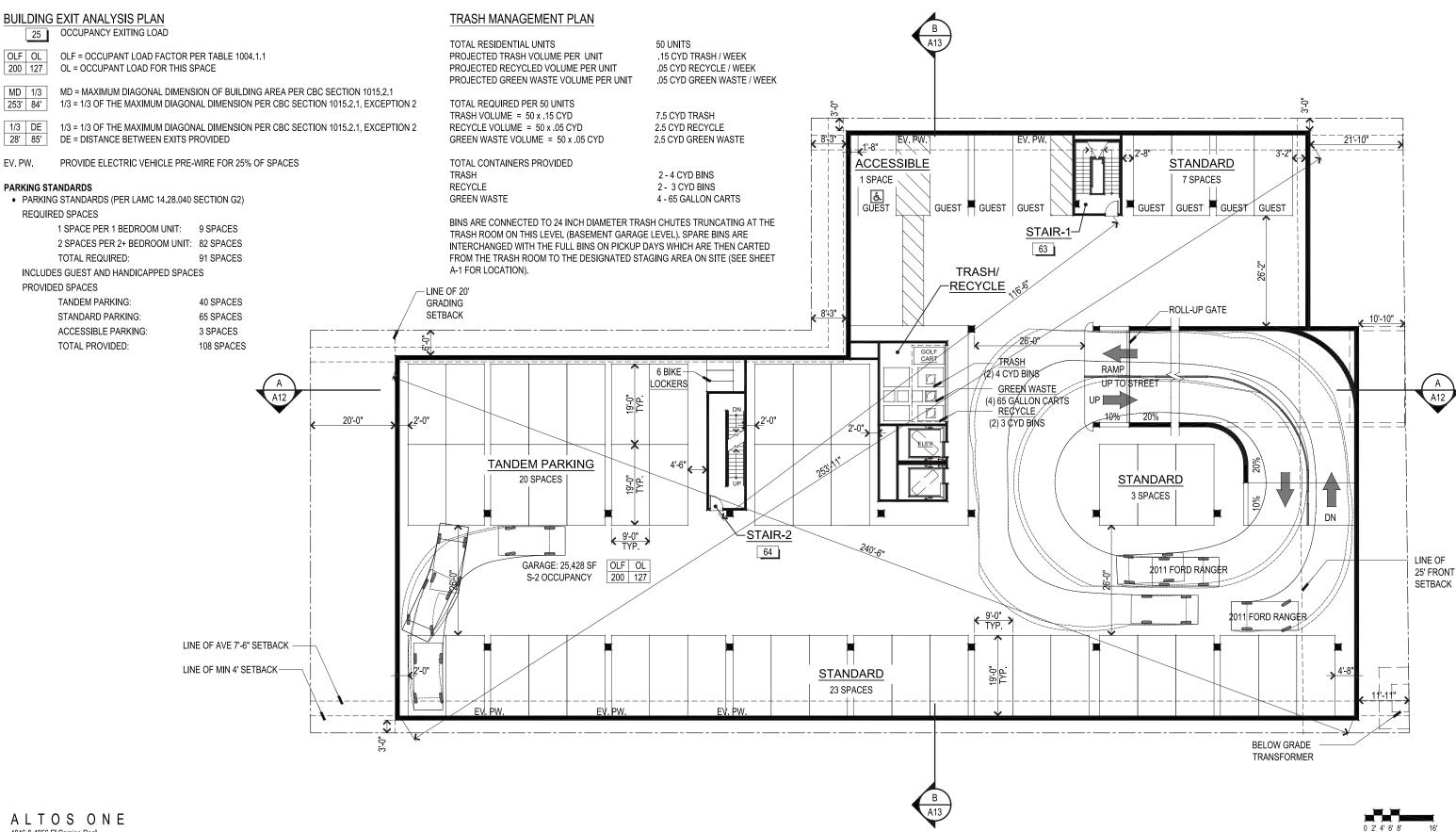
PROJECT MATERIALS



Los Altos, CA July 18, 2018 LUXONE LLC



LOWER LEVEL BASEMENT FLOOR PLAN



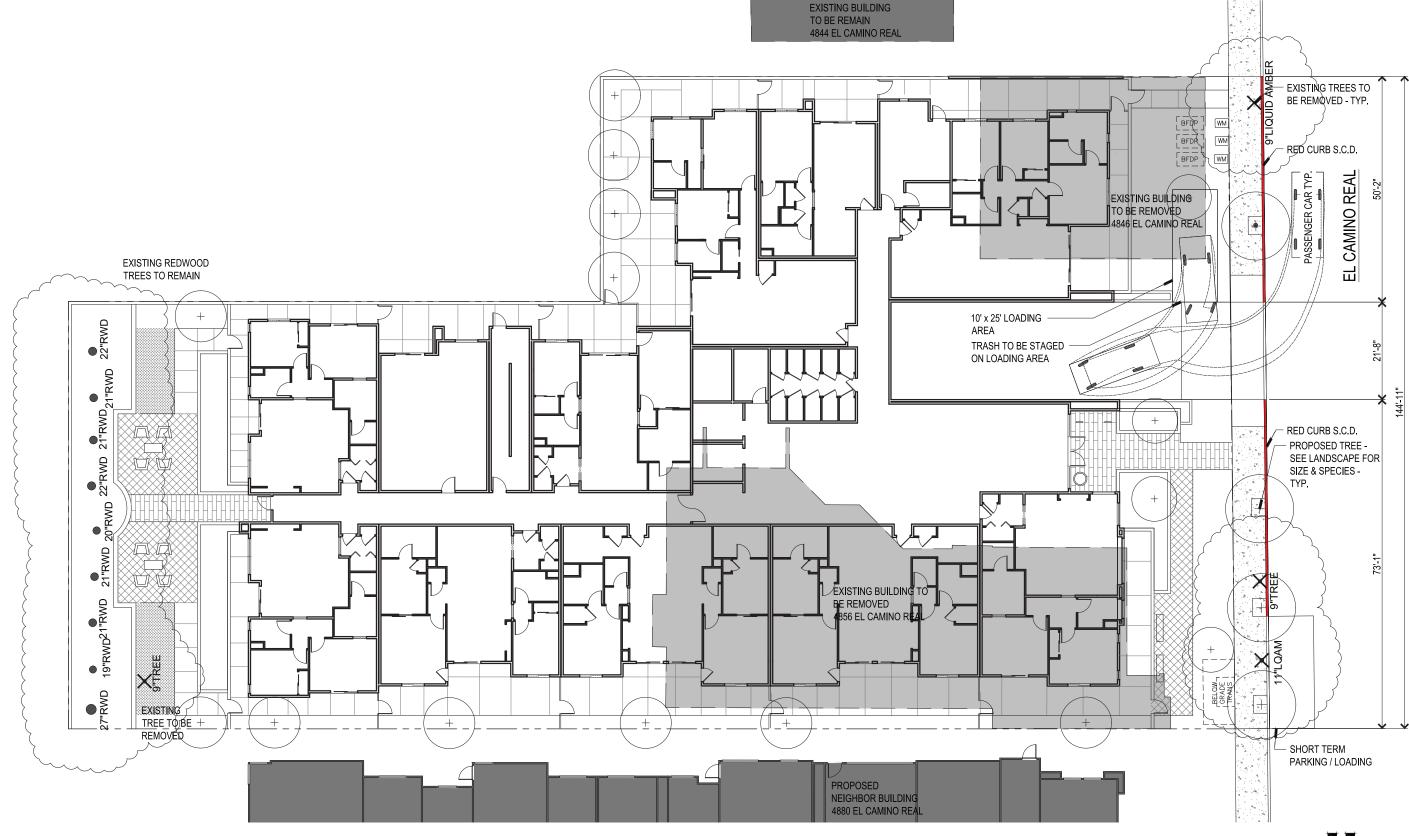
4846 & 4856 El Camino Real

Los Altos, CA July 18, 2018



925.634.7000 www.straussdesign.com SDG Architects, Inc.

UPPER LEVEL BASEMENT FLOOR PLAN



A L T O S O N E 4846 & 4856 El Camino Real Los Altos, CA

July 18, 2018

LUXONE LLC

572 Chimalus Dr. Palo Alto, CA 94306



A2.1 ARCHITECTURAL SITE PLAN

25 OCCUPANCY EXITING LOAD

OLF OL OLF = OCCUPANT LOAD FACTOR PER TABLE 1004.1.1

200 32 OL = OCCUPANT LOAD FOR THIS SPACE

MD | 1/3 | MD = MAXIMUM DIAGONAL DIMENSION OF BUILDING AREA PER CBC SECTION 1015.2.1

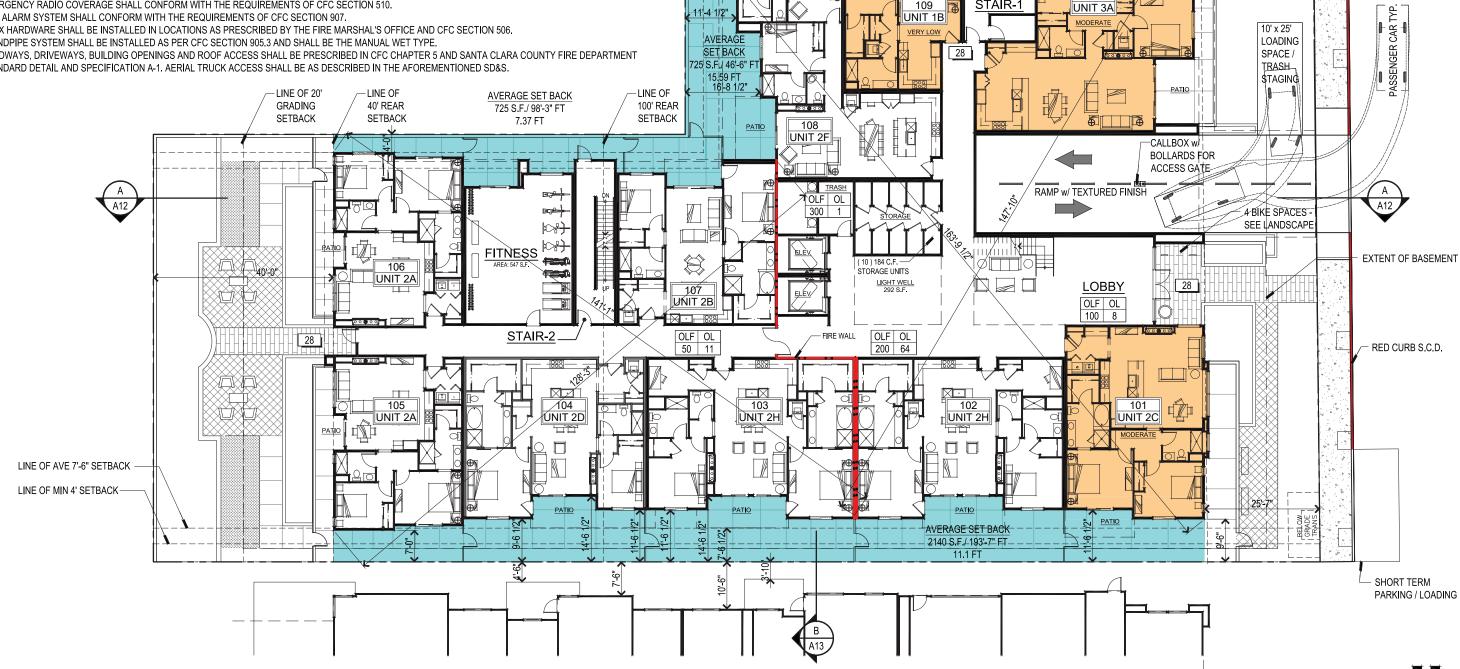
232' 77' 1/3 = 1/3 OF THE MAXIMUM DIAGONAL DIMENSION PER CBC SECTION 1015.2.1, EXCEPTION 2

1/3 DE 1/3 = 1/3 OF THE MAXIMUM DIAGONAL DIMENSION PER CBC SECTION 1015.2.1, EXCEPTION 2

77' 80" DE = DISTANCE BETWEEN EXITS PROVIDED

## FIRE DEPARTMENT ACCESS

- EMERGENCY RADIO COVERAGE SHALL CONFORM WITH THE REQUIREMENTS OF CFC SECTION 510.
- FIRE ALARM SYSTEM SHALL CONFORM WITH THE REQUIREMENTS OF CFC SECTION 907.
- KNOX HARDWARE SHALL BE INSTALLED IN LOCATIONS AS PRESCRIBED BY THE FIRE MARSHAL'S OFFICE AND CFC SECTION 506.
- STANDPIPE SYSTEM SHALL BE INSTALLED AS PER CFC SECTION 905,3 AND SHALL BE THE MANUAL WET TYPE.
- ROADWAYS, DRIVEWAYS, BUILDING OPENINGS AND ROOF ACCESS SHALL BE PRESCRIBED IN CFC CHAPTER 5 AND SANTA CLARA COUNTY FIRE DEPARTMENT STANDARD DETAIL AND SPECIFICATION A-1. AERIAL TRUCK ACCESS SHALL BE AS DESCRIBED IN THE AFOREMENTIONED SD&S.



SET BACK

725 S.Fi ( 46'-6" F

AVERAGE SET BACK 832 S.F./101'-9"FT

- 8.2 FT

UNIT 3A

MODERATE

STAIR-1

109

UNIT 1B

VERY LOW

28

1

26'-4 1/2"

BFDP

BFDP

BFDP

10' x 25'

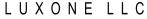
SPACE /

TRASH

LOADING

ALTOS ONE

4846 & 4856 El Camino Real Los Altos, CA July 18, 2018



FIRST FLOOR PLAN

RED CURB S.C.D.

LINE OF

25' FRONT **SETBACK** 

25 OCCUPANCY EXITING LOAD

OLF OL OLF = OCCUPANT LOAD FACTOR PER TABLE 1004.1.1

200 32 OL = OCCUPANT LOAD FOR THIS SPACE

MD | 1/3 | MD = MAXIMUM DIAGONAL DIMENSION OF BUILDING AREA PER CBC SECTION 1015.2.1

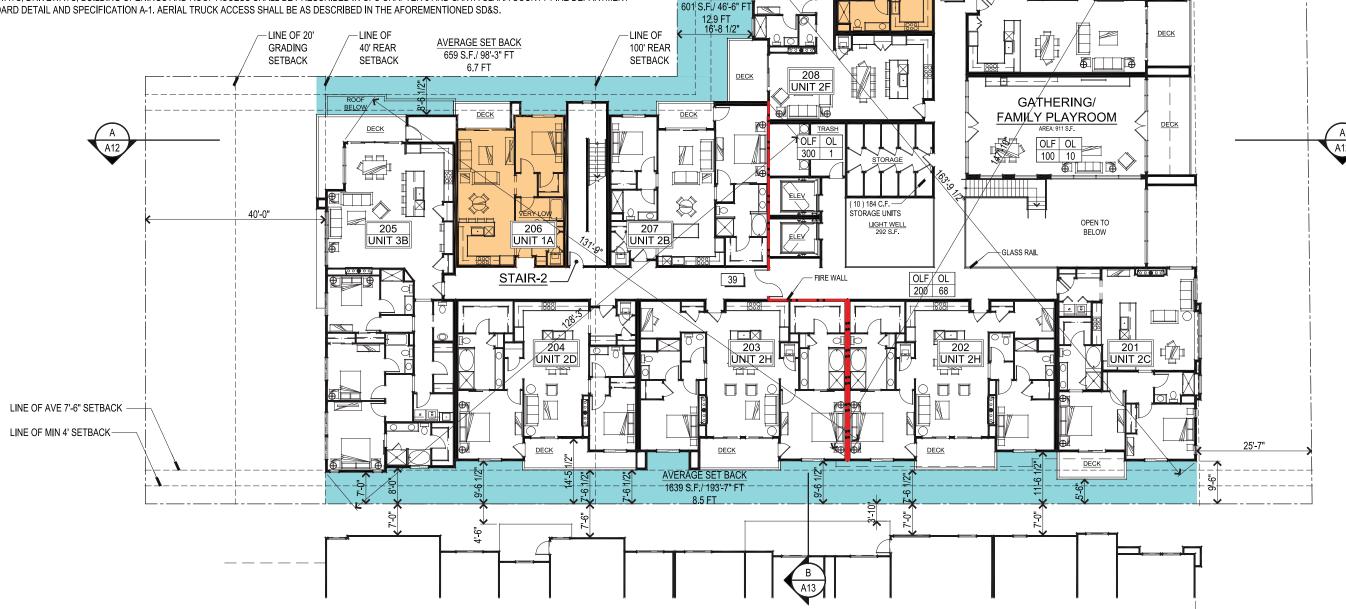
232' 77' 1/3 = 1/3 OF THE MAXIMUM DIAGONAL DIMENSION PER CBC SECTION 1015.2.1, EXCEPTION 2

1/3 DE 1/3 = 1/3 OF THE MAXIMUM DIAGONAL DIMENSION PER CBC SECTION 1015.2.1, EXCEPTION 2

77' 80" DE = DISTANCE BETWEEN EXITS PROVIDED

## FIRE DEPARTMENT ACCESS

- EMERGENCY RADIO COVERAGE SHALL CONFORM WITH THE REQUIREMENTS OF CFC SECTION 510.
- 2. FIRE ALARM SYSTEM SHALL CONFORM WITH THE REQUIREMENTS OF CFC SECTION 907.
- KNOX HARDWARE SHALL BE INSTALLED IN LOCATIONS AS PRESCRIBED BY THE FIRE MARSHAL'S OFFICE AND CFC SECTION 506.
- STANDPIPE SYSTEM SHALL BE INSTALLED AS PER CFC SECTION 905,3 AND SHALL BE THE MANUAL WET TYPE.
- ROADWAYS, DRIVEWAYS, BUILDING OPENINGS AND ROOF ACCESS SHALL BE PRESCRIBED IN CFC CHAPTER 5 AND SANTA CLARA COUNTY FIRE DEPARTMENT STANDARD DETAIL AND SPECIFICATION A-1. AERIAL TRUCK ACCESS SHALL BE AS DESCRIBED IN THE AFOREMENTIONED SD&S.



SET BACK

ALTOS ONE

4846 & 4856 El Camino Real Los Altos, CA July 18, 2018

Palo Alto, CA 94306



925.634.7000 www.straussdesign.com SDG Architects, Inc.

SECOND FLOOR PLAN

AVERAGE SET BACK 764 S.F./101'-9" FT

7.5-FT

JNIT 3A

209

VERY LOW

40

UNIT 1B

26'-4.1/2"

LINE OF

25' FRONT

SETBACK

25 OCCUPANCY EXITING LOAD

OLF OL OLF = OCCUPANT LOAD FACTOR PER TABLE 1004.1.1

200 32 OL = OCCUPANT LOAD FOR THIS SPACE

MD | 1/3 | MD = MAXIMUM DIAGONAL DIMENSION OF BUILDING AREA PER CBC SECTION 1015.2.1

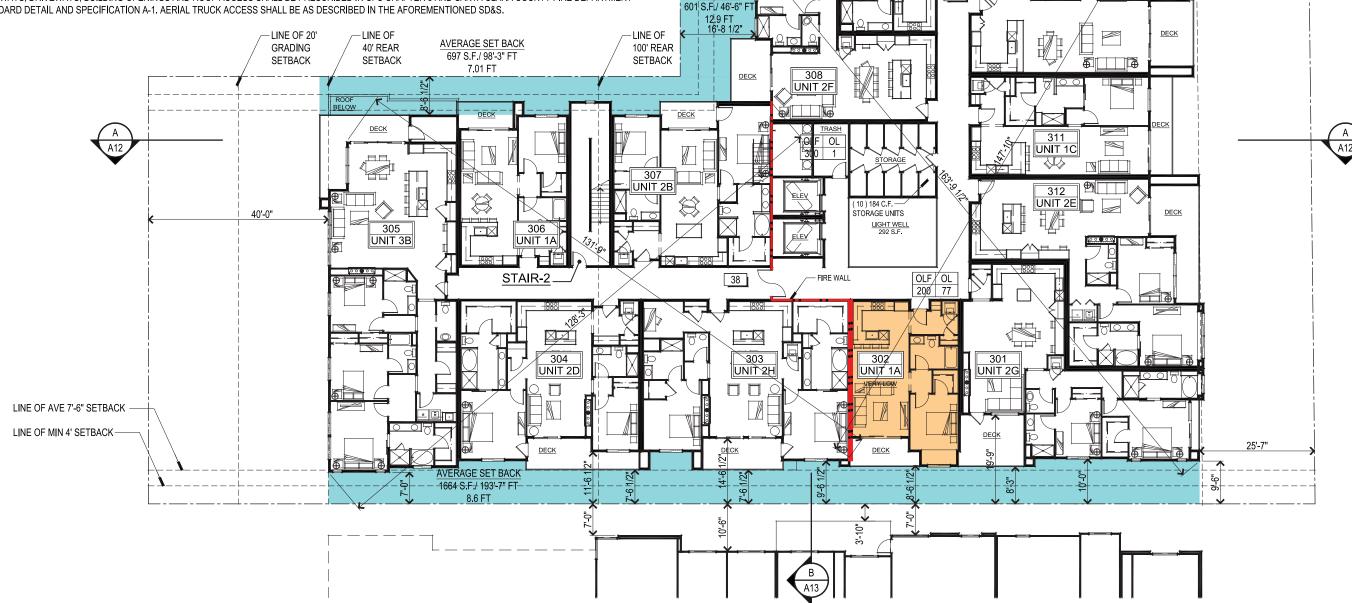
232' 77' 1/3 = 1/3 OF THE MAXIMUM DIAGONAL DIMENSION PER CBC SECTION 1015.2.1, EXCEPTION 2

1/3 DE 1/3 = 1/3 OF THE MAXIMUM DIAGONAL DIMENSION PER CBC SECTION 1015.2.1, EXCEPTION 2

77' 80" DE = DISTANCE BETWEEN EXITS PROVIDED

## FIRE DEPARTMENT ACCESS

- EMERGENCY RADIO COVERAGE SHALL CONFORM WITH THE REQUIREMENTS OF CFC SECTION 510.
- 2. FIRE ALARM SYSTEM SHALL CONFORM WITH THE REQUIREMENTS OF CFC SECTION 907.
- KNOX HARDWARE SHALL BE INSTALLED IN LOCATIONS AS PRESCRIBED BY THE FIRE MARSHAL'S OFFICE AND CFC SECTION 506.
- STANDPIPE SYSTEM SHALL BE INSTALLED AS PER CFC SECTION 905,3 AND SHALL BE THE MANUAL WET TYPE.
- ROADWAYS, DRIVEWAYS, BUILDING OPENINGS AND ROOF ACCESS SHALL BE PRESCRIBED IN CFC CHAPTER 5 AND SANTA CLARA COUNTY FIRE DEPARTMENT STANDARD DETAIL AND SPECIFICATION A-1. AERIAL TRUCK ACCESS SHALL BE AS DESCRIBED IN THE AFOREMENTIONED SD&S.



SET BACK

ALTOS ONE

4846 & 4856 El Camino Real Los Altos, CA July 18, 2018

Palo Alto, CA 94306

LUXONE LLC 572 Chimalus Dr.

THIRD FLOOR PLAN



AVERAGE SET BACK 764 S.F./101'-9"FT

– <del>7</del>.5-FT –

JNIT 3A

39

26'-4\_1/2"\_

LINE OF

25' FRONT

SETBACK

25 OCCUPANCY EXITING LOAD

OLF OL OLF = OCCUPANT LOAD FACTOR PER TABLE 1004.1.1

200 32 OL = OCCUPANT LOAD FOR THIS SPACE

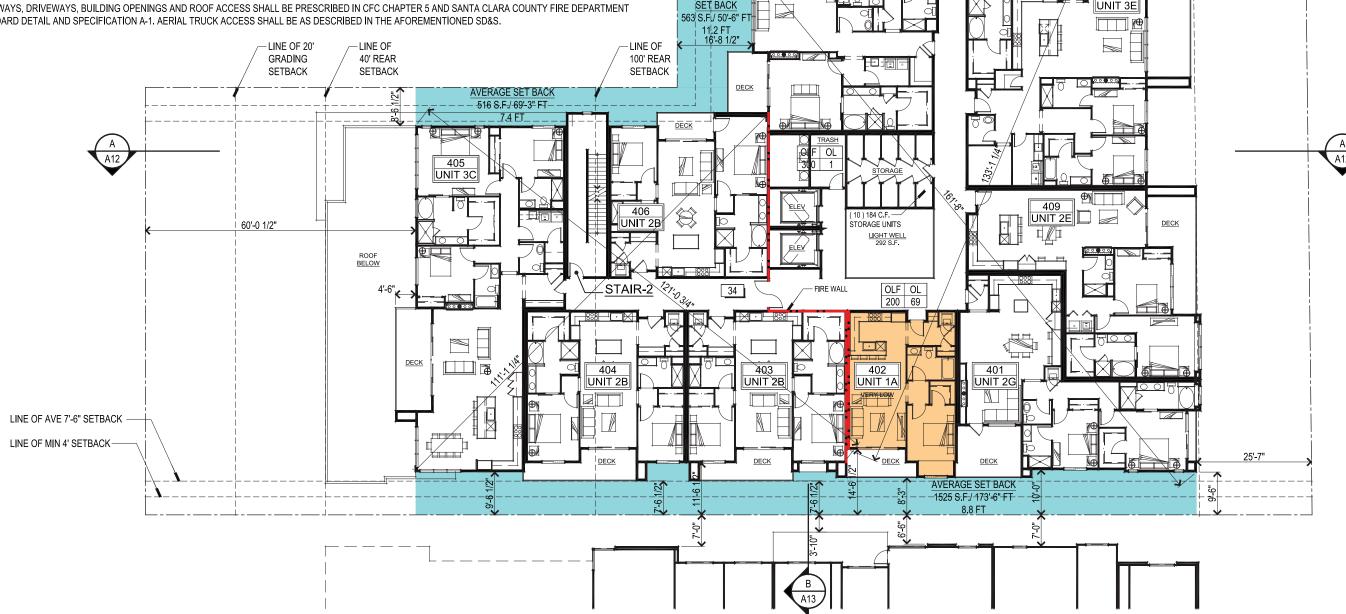
MD | 1/3 | MD = MAXIMUM DIAGONAL DIMENSION OF BUILDING AREA PER CBC SECTION 1015.2.1

232' 77' 1/3 = 1/3 OF THE MAXIMUM DIAGONAL DIMENSION PER CBC SECTION 1015.2.1, EXCEPTION 2

1/3 DE 1/3 = 1/3 OF THE MAXIMUM DIAGONAL DIMENSION PER CBC SECTION 1015.2.1, EXCEPTION 2 77' 80" DE = DISTANCE BETWEEN EXITS PROVIDED

## FIRE DEPARTMENT ACCESS

- EMERGENCY RADIO COVERAGE SHALL CONFORM WITH THE REQUIREMENTS OF CFC SECTION 510.
- 2. FIRE ALARM SYSTEM SHALL CONFORM WITH THE REQUIREMENTS OF CFC SECTION 907.
- KNOX HARDWARE SHALL BE INSTALLED IN LOCATIONS AS PRESCRIBED BY THE FIRE MARSHAL'S OFFICE AND CFC SECTION 506.
- STANDPIPE SYSTEM SHALL BE INSTALLED AS PER CFC SECTION 905,3 AND SHALL BE THE MANUAL WET TYPE.
- ROADWAYS, DRIVEWAYS, BUILDING OPENINGS AND ROOF ACCESS SHALL BE PRESCRIBED IN CFC CHAPTER 5 AND SANTA CLARA COUNTY FIRE DEPARTMENT STANDARD DETAIL AND SPECIFICATION A-1. AERIAL TRUCK ACCESS SHALL BE AS DESCRIBED IN THE AFOREMENTIONED SD&S.



407

UNIT 3D

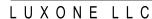
DECK

AVERAGE

SET BACK

ALTOS ONE

4846 & 4856 El Camino Real Los Altos, CA July 18, 2018



FOURTH FLOOR PLAN

AVERAGE SET BACK 690 S.F / 89'-9" FT

\_25'-4\_1/2"

LINE OF

25' FRONT

SETBACK

<u>DECK</u>

408

UNIT 3E

25 OCCUPANCY EXITING LOAD

OLF OL OLF = OCCUPANT LOAD FACTOR PER TABLE 1004.1.1

200 32 OL = OCCUPANT LOAD FOR THIS SPACE

MD | 1/3 | MD = MAXIMUM DIAGONAL DIMENSION OF BUILDING AREA PER CBC SECTION 1015.2.1

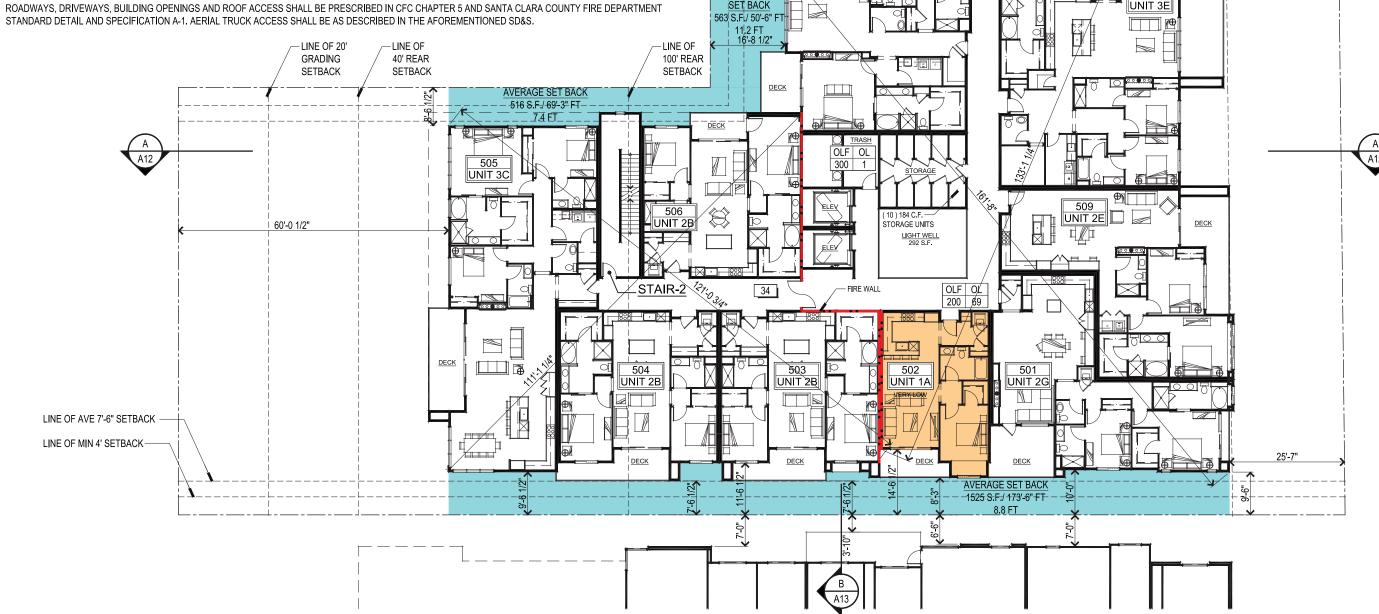
232' 77' 1/3 = 1/3 OF THE MAXIMUM DIAGONAL DIMENSION PER CBC SECTION 1015.2.1, EXCEPTION 2

1/3 DE 1/3 = 1/3 OF THE MAXIMUM DIAGONAL DIMENSION PER CBC SECTION 1015.2.1, EXCEPTION 2

77' 80" DE = DISTANCE BETWEEN EXITS PROVIDED

## FIRE DEPARTMENT ACCESS

- EMERGENCY RADIO COVERAGE SHALL CONFORM WITH THE REQUIREMENTS OF CFC SECTION 510.
- 2. FIRE ALARM SYSTEM SHALL CONFORM WITH THE REQUIREMENTS OF CFC SECTION 907.
- KNOX HARDWARE SHALL BE INSTALLED IN LOCATIONS AS PRESCRIBED BY THE FIRE MARSHAL'S OFFICE AND CFC SECTION 506.
- STANDPIPE SYSTEM SHALL BE INSTALLED AS PER CFC SECTION 905,3 AND SHALL BE THE MANUAL WET TYPE.
- ROADWAYS, DRIVEWAYS, BUILDING OPENINGS AND ROOF ACCESS SHALL BE PRESCRIBED IN CFC CHAPTER 5 AND SANTA CLARA COUNTY FIRE DEPARTMENT



507

UNIT 3D

AVERAGE

SET BACK

ALTOS ONE

4846 & 4856 El Camino Real Los Altos, CA July 18, 2018

572 Chimalus Dr.

Palo Alto, CA 94306

LUXONE LLC





AVERAGE SET BACK 690 S.F / 89'-9" FT

\_25'-4\_1/2"

LINE OF

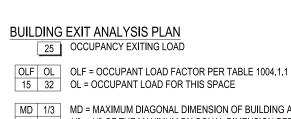
25' FRONT

SETBACK

<u>DECK</u>

508

UNIT 3E



MD | 1/3 | MD = MAXIMUM DIAGONAL DIMENSION OF BUILDING AREA PER CBC SECTION 1015.2.1 123' 41' 1/3 = 1/3 OF THE MAXIMUM DIAGONAL DIMENSION PER CBC SECTION 1015.2.1, EXCEPTION 2

1/3 DE 1/3 = 1/3 OF THE MAXIMUM DIAGONAL DIMENSION PER CBC SECTION 1015.2.1, EXCEPTION 2 27' 83" DE = DISTANCE BETWEEN EXITS PROVIDED

# **ROOF CALCULATIONS**

**ROOF AREA** THIRD FLOOR ROOF= 1,419 S.F. FIFTH FLOOR ROOF= 19.169 S.F. TOTAL ROOF AREA= 20,588 S.F.

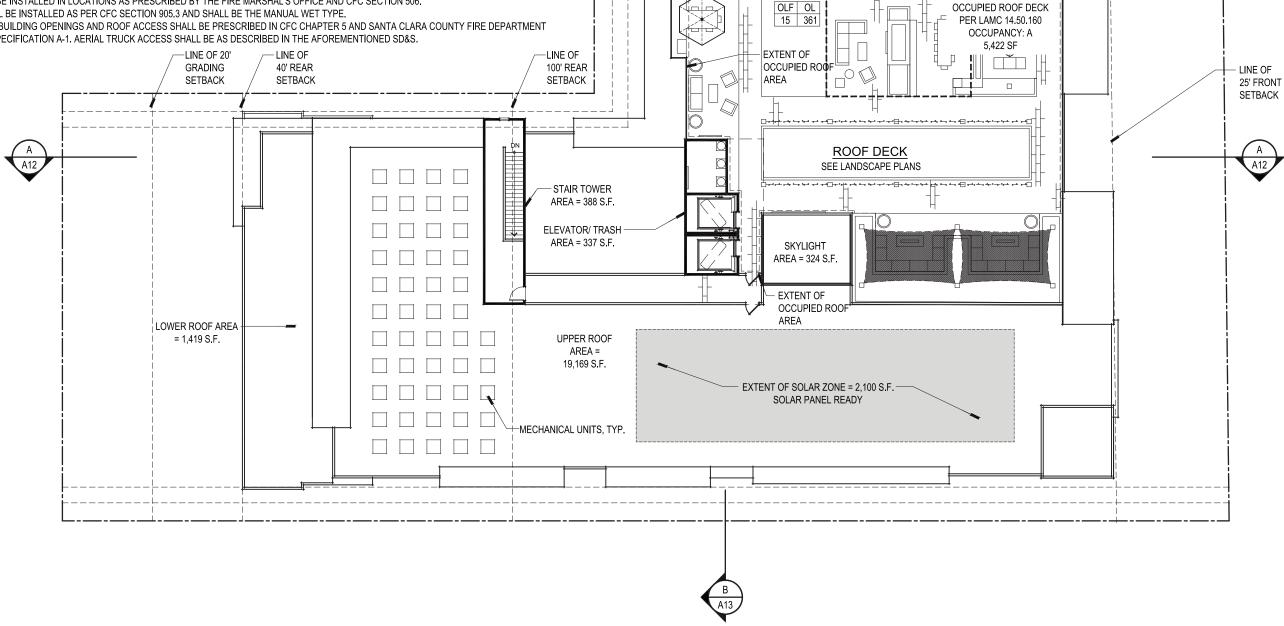
**ENCROACHMENT FOR ROOF STRUCTURES** \*INCLUDES ELEVATORS, STAIRS, & TRASH

\*INCLUDES ROOF DECK

ALLOWED = 4% (824 S.F.) REQUESTED = 4.6% (942 S.F.)

## FIRE DEPARTMENT ACCESS

- 1. EMERGENCY RADIO COVERAGE SHALL CONFORM WITH THE REQUIREMENTS OF CFC SECTION 510.
- 2. FIRE ALARM SYSTEM SHALL CONFORM WITH THE REQUIREMENTS OF CFC SECTION 907.
- KNOX HARDWARE SHALL BE INSTALLED IN LOCATIONS AS PRESCRIBED BY THE FIRE MARSHAL'S OFFICE AND CFC SECTION 506,
- STANDPIPE SYSTEM SHALL BE INSTALLED AS PER CFC SECTION 905,3 AND SHALL BE THE MANUAL WET TYPE.
- ROADWAYS, DRIVEWAYS, BUILDING OPENINGS AND ROOF ACCESS SHALL BE PRESCRIBED IN CFC CHAPTER 5 AND SANTA CLARA COUNTY FIRE DEPARTMENT STANDARD DETAIL AND SPECIFICATION A-1. AERIAL TRUCK ACCESS SHALL BE AS DESCRIBED IN THE AFOREMENTIONED SD&S.



ALTOS ONE 4846 & 4856 El Camino Real Los Altos, CA

LUXONE LLC

July 18, 2018

572 Chimalus Dr.

Palo Alto, CA 94306



STAIR TOWER

AREA = 217 S.F.

OCCUPIED ROOF DECK

PROVIDE VISUAL &

AUDIBLE ALARMS





Los Altos, CA July 18, 2018







Los Altos, CA July 18, 2018







Los Altos, CA July 18, 2018







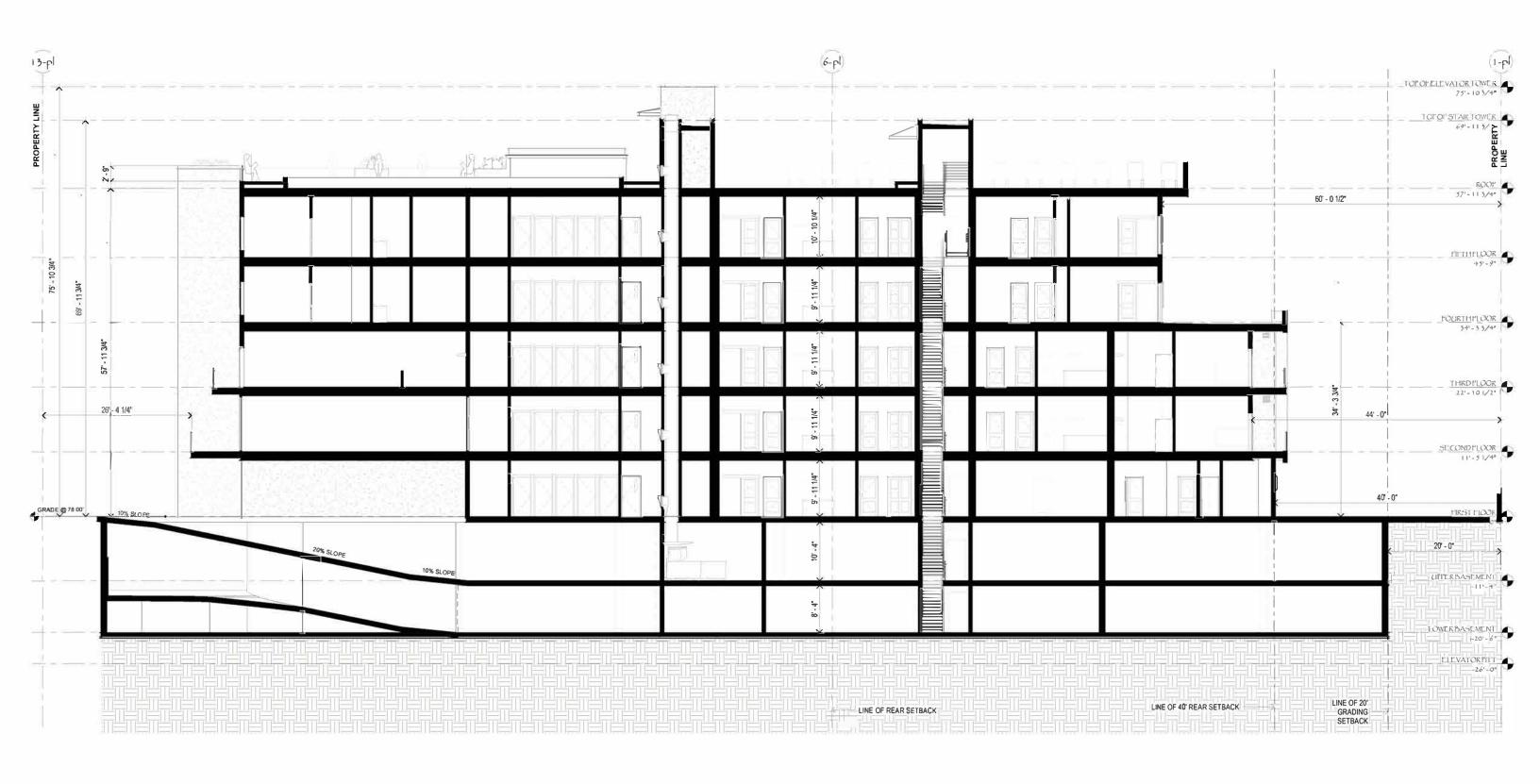
A L T O S O N E 4846 & 4856 El Camino Real

Los Altos, CA July 18, 2018



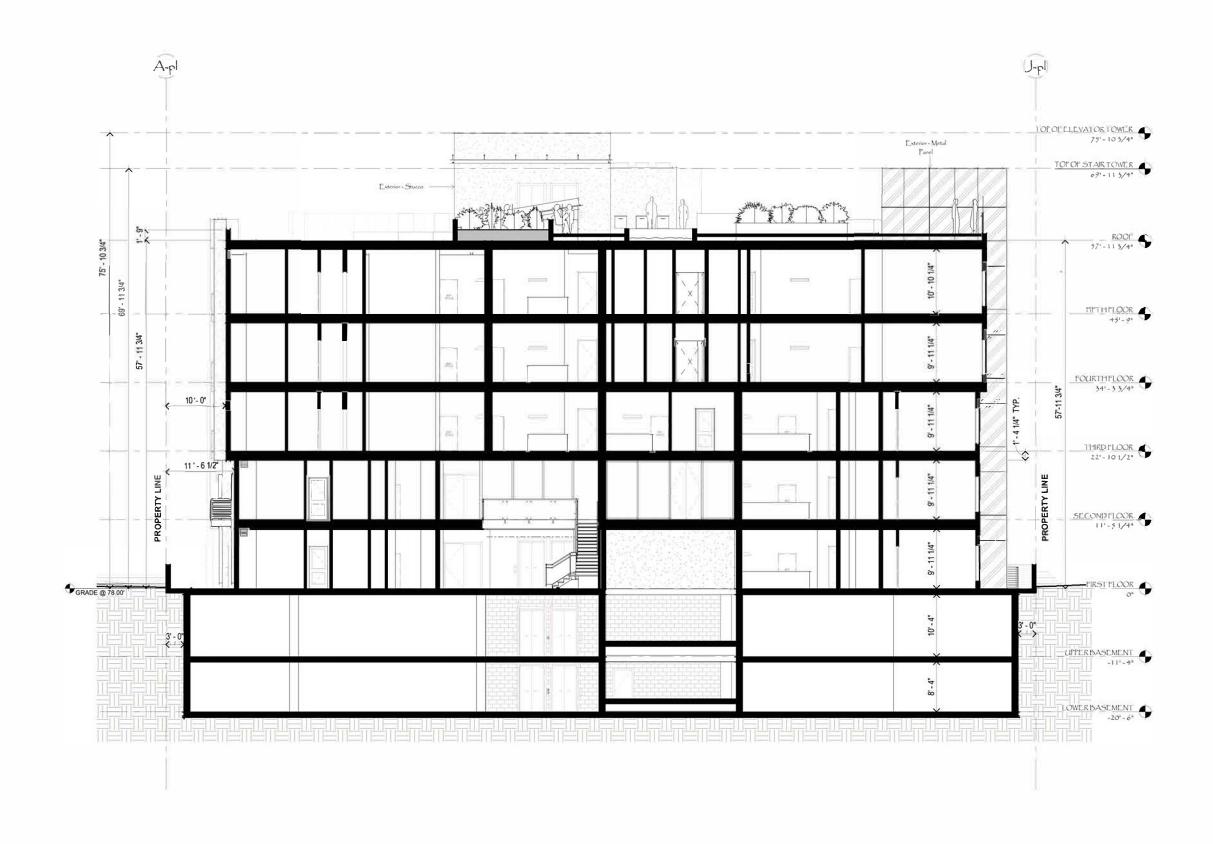
LUXONE LLC





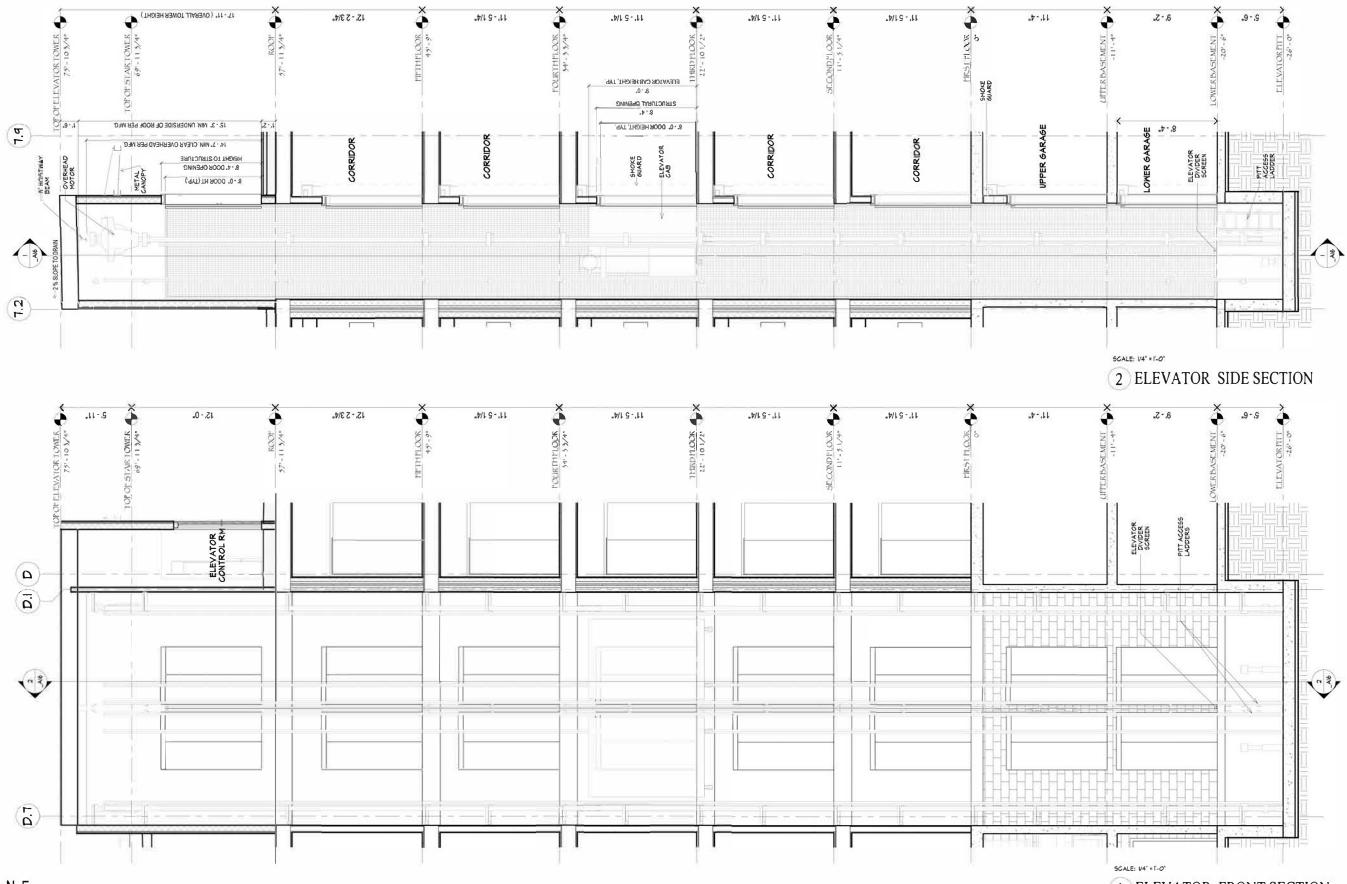
A L T O S O N E 4846 & 4856 El Camino Real Los Altos, CA July 18, 2018





A L T O S O N E Los Altos, CA July 18, 2018



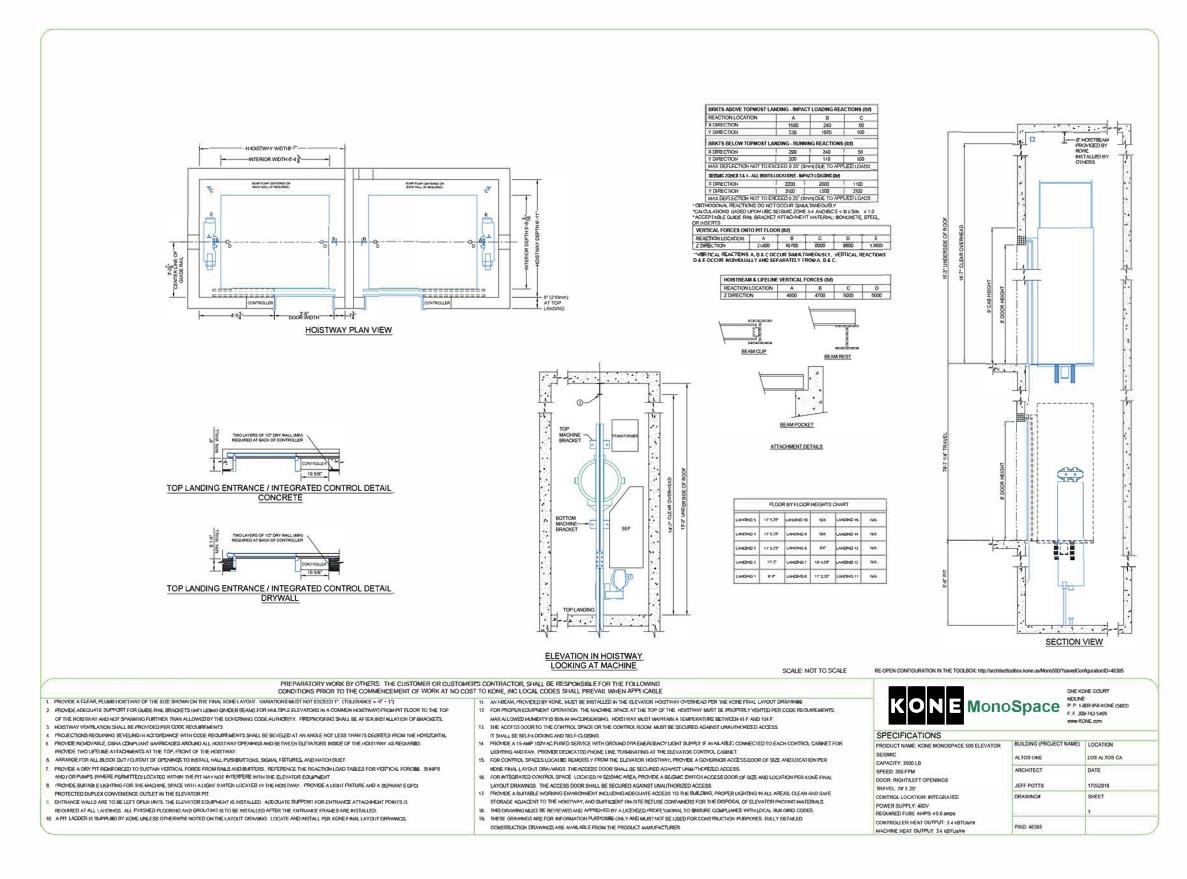


A L T O S O N E 4846 & 4856 El Camino Real Los Altos, CA

1 ELEVATOR FRONT SECTION

A14 ELEVATOR SECTIONS

July 18, 2018



A L T O S O N E 4846 & 4856 El Camino Real Los Altos, CA July 18, 2018

LUXONE LLC
572 Chimalus Dr.

Palo Alto, CA 94306

A15 ELEVATOR CUT SHEET





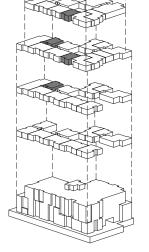








00 BUILDING SHELL



NOTE: FOR ACTUAL DECK, WINDOW, AND EXTERIOR DOOR LOCATIONS SEE BUILDING PLANS

SQUARE FOOTAGES LIVING 782 SQ. FT.



SDG Architects, Inc.





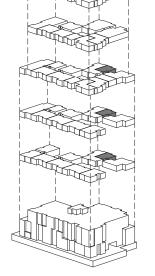
04 4<sup>™</sup> FLOOR UNITS

03) 3<sup>RD</sup> FLOOR UNITS

02) 2<sup>№</sup> FLOOR UNITS

01) 1<sup>ST</sup> FLOOR UNITS

00 BUILDING SHELL



NOTE: FOR ACTUAL DECK, WINDOW, AND EXTERIOR DOOR LOCATIONS SEE BUILDING PLANS

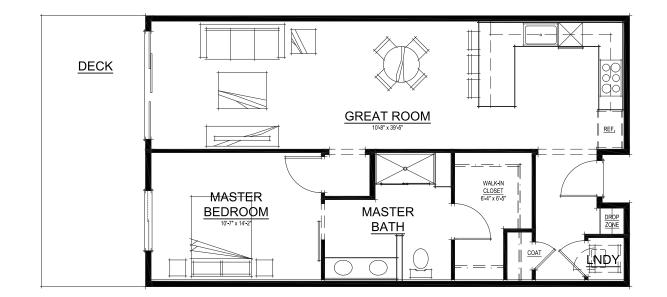
SQUARE FOOTAGES

LIVING

785 SQ. FT.









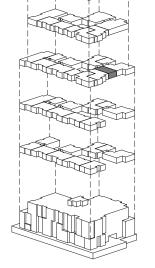
04 4<sup>™</sup> FLOOR UNITS

03) 3<sup>RD</sup> FLOOR UNITS

02) 2<sup>№</sup> FLOOR UNITS

01) 1<sup>ST</sup> FLOOR UNITS

00 BUILDING SHELL



NOTE: FOR ACTUAL DECK, WINDOW, AND EXTERIOR DOOR LOCATIONS SEE BUILDING PLANS

SQUARE FOOTAGES LIVING 902 SQ. FT.



SDG Architects, Inc.





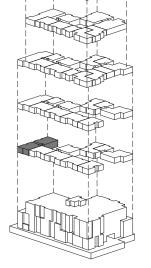










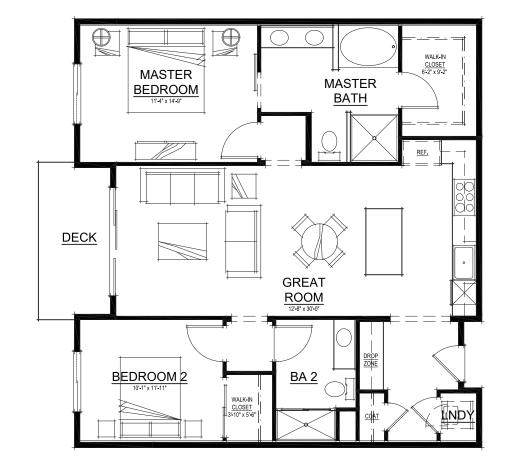


NOTE: FOR ACTUAL DECK, WINDOW, AND EXTERIOR DOOR LOCATIONS SEE BUILDING PLANS

SQUARE FOOTAGES LIVING 1081 SQ. FT.



SDG Architects, Inc.





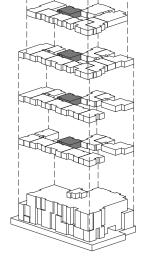










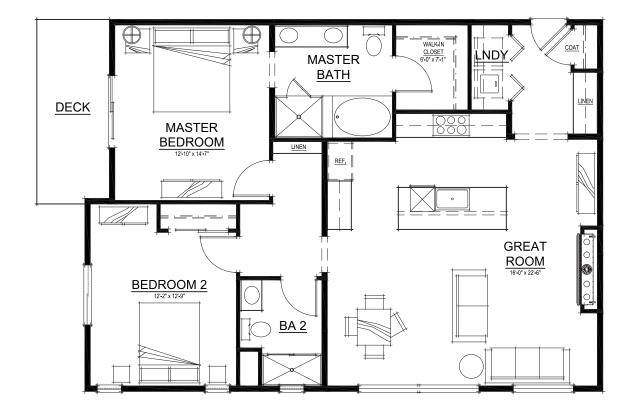


NOTE: FOR ACTUAL DECK, WINDOW, AND EXTERIOR DOOR LOCATIONS SEE BUILDING PLANS

SQUARE FOOTAGES			
LIVING	1169 SQ. FT.		



SDG Architects, Inc.





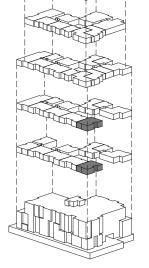






01) 1<sup>ST</sup> FLOOR UNITS

00 BUILDING SHELL

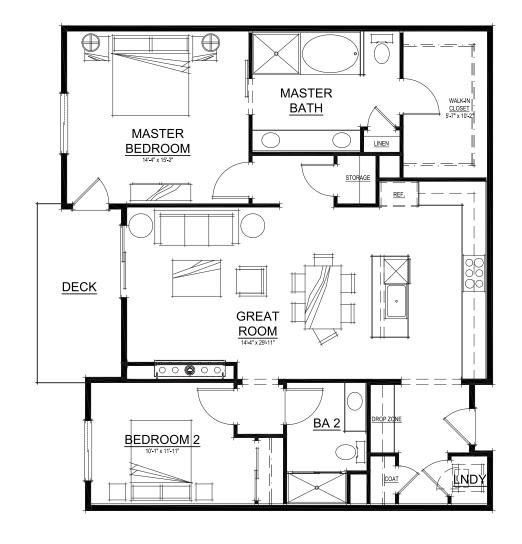


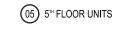
NOTE: FOR ACTUAL DECK, WINDOW, AND EXTERIOR DOOR LOCATIONS SEE BUILDING PLANS

SQUARE FOOTAGES

LIVING 1308 SQ. FT.







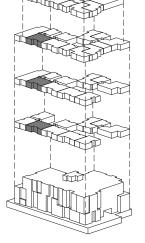








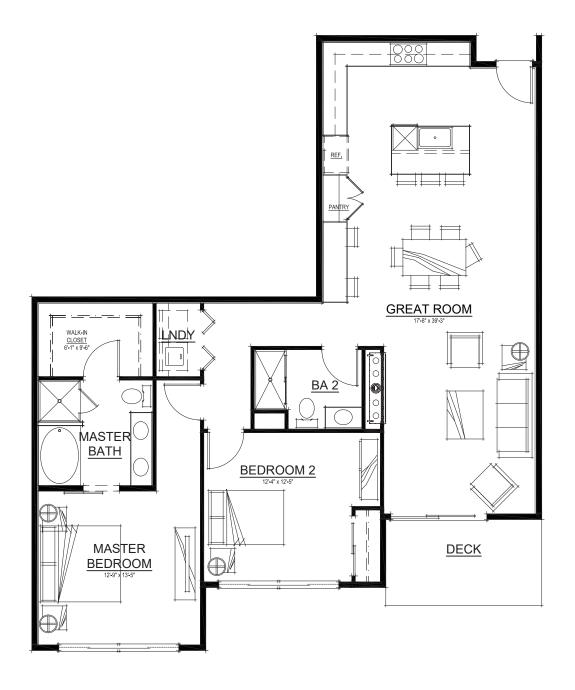




NOTE: FOR ACTUAL DECK, WINDOW, AND EXTERIOR DOOR LOCATIONS SEE BUILDING PLANS

SQUARE FOOTAGES LIVING 1353 SQ. FT.





05) 5<sup>™</sup> FLOOR UNITS

04) 4™ FLOOR UNITS

03) 3<sup>RD</sup> FLOOR UNITS

02) 2<sup>№</sup> FLOOR UNITS

01) 1<sup>ST</sup> FLOOR UNITS

00 BUILDING SHELL



NOTE: FOR ACTUAL DECK, WINDOW, AND EXTERIOR DOOR LOCATIONS SEE BUILDING PLANS

SQUARE FOOTAGES LIVING 1430 SQ. FT.





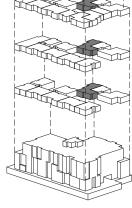




02) 2<sup>№</sup> FLOOR UNITS

01) 1<sup>ST</sup> FLOOR UNITS

00 BUILDING SHELL

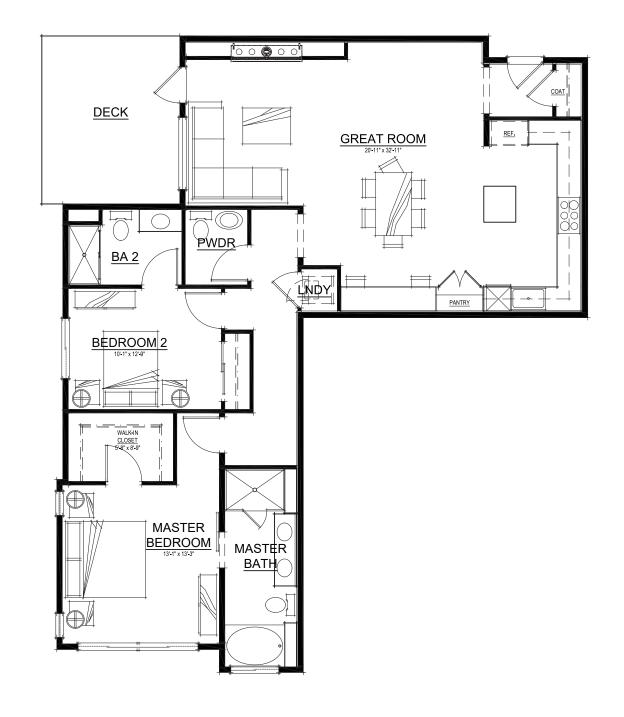


NOTE: FOR ACTUAL DECK, WINDOW, AND EXTERIOR DOOR LOCATIONS SEE BUILDING PLANS

SQUARE FOOTAGES LIVING 1407 SQ. FT.



SDG Architects, Inc.



05) 5<sup>™</sup> FLOOR UNITS

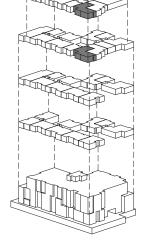
04) 4™ FLOOR UNITS

03) 3<sup>RD</sup> FLOOR UNITS

02) 2<sup>№</sup> FLOOR UNITS

01) 1<sup>ST</sup> FLOOR UNITS

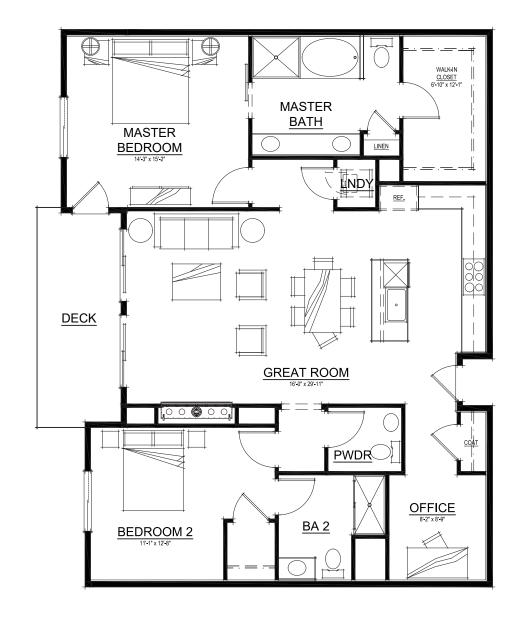
00 BUILDING SHELL

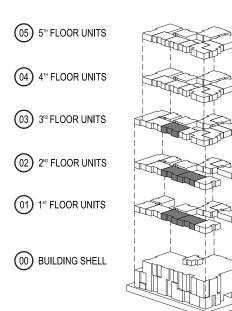


NOTE: FOR ACTUAL DECK, WINDOW, AND EXTERIOR DOOR LOCATIONS SEE BUILDING PLANS

SQUARE FOOTAGES LIVING 1451 SQ. FT.





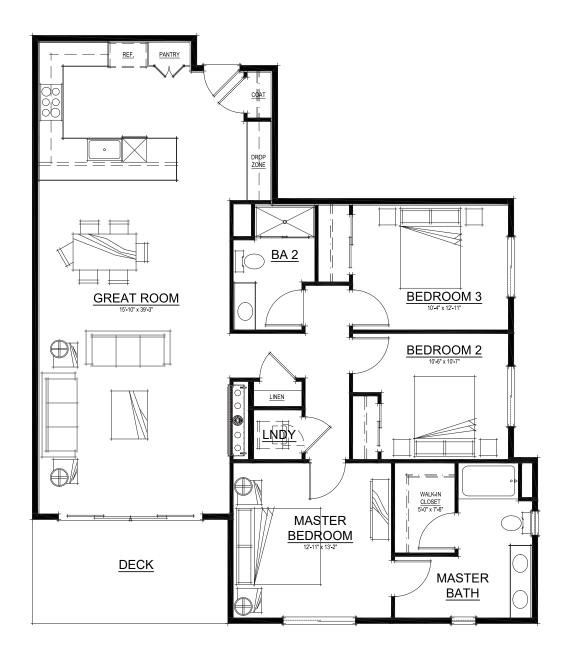


NOTE: FOR ACTUAL DECK, WINDOW, AND EXTERIOR DOOR LOCATIONS SEE BUILDING PLANS

SQUARE FOOTAGES LIVING 1546 SQ. FT.



SDG Architects, Inc.





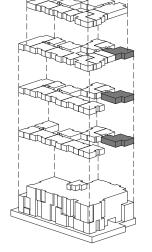




02) 2<sup>№</sup> FLOOR UNITS

01) 1<sup>ST</sup> FLOOR UNITS

00 BUILDING SHELL



NOTE: FOR ACTUAL DECK, WINDOW, AND EXTERIOR DOOR LOCATIONS SEE BUILDING PLANS

SQUARE FOOTAGES LIVING 1569 SQ. FT.





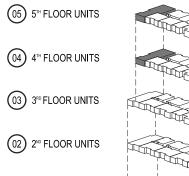
NOTE: FOR ACTUAL DECK, WINDOW, AND EXTERIOR DOOR LOCATIONS SEE BUILDING PLANS

SQUARE FOOTAGES LIVING 2053 SQ. FT.









01) 1<sup>ST</sup> FLOOR UNITS

00 BUILDING SHELL

NOTE: FOR ACTUAL DECK, WINDOW, AND EXTERIOR DOOR LOCATIONS SEE BUILDING PLANS

SQUARE FOOTAGES LIVING 2159 SQ. FT.



SDG Architects, Inc.





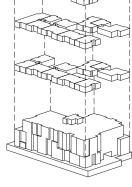










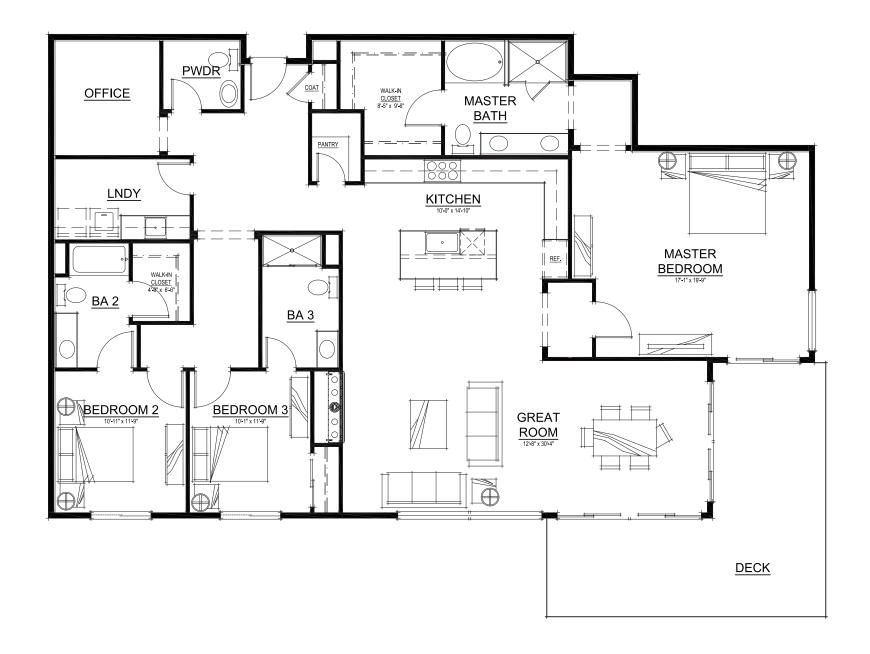


NOTE: FOR ACTUAL DECK, WINDOW, AND EXTERIOR DOOR LOCATIONS SEE BUILDING PLANS

SQUARE FOOTAGES					
LIVING	2140 SQ. FT.				

UNIT 3D FLOOR PLAN

SDG Architects, Inc.





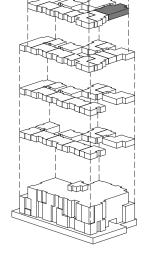












NOTE: FOR ACTUAL DECK, WINDOW, AND EXTERIOR DOOR LOCATIONS SEE BUILDING PLANS

	SQUARE FOOTAGES					
LIVING	2302 SQ. FT.					





VIEW FROM EL CAMINO REAL

A L T O S O N E 4846 & 4856 El Camino Real Los Altos, CA July 18, 2018

BUILDING PERSPECTIVE



VIEW FROM CORNER OF EL CAMINO REAL / SHOWERS DRIVE

A L T O S O N E 4846 & 4856 El Camino Real Los Altos, CA July 18, 2018

BUILDING PERSPECTIVE



VIEW FROM CORNER OF EL CAMINO REAL / SHOWERS DRIVE

A L T O S O N E 4846 & 4856 El Camino Real Los Altos, CA July 18, 2018

BUILDING PERSPECTIVE



PEDESTRIAN VIEW FROM EL CAMINO REAL



VIEW FROM 2ND STORY WINDOW OF APARTMENTS TO THE REAR w/o SCREEN TREES



PEDESTRIAN VIEW FROM SEE'S CANDY



**ROOF DECK** 

VIGNETTE PERSPECTIVES



SDG Architects, Inc.

A L T O S O N E 4846 & 4856 El Camino Real Los Altos, CA

July 18, 2018



SOUTH PERSPECTIVE



NORTH PERSPECTIVE



WEST PERSPECTIVE

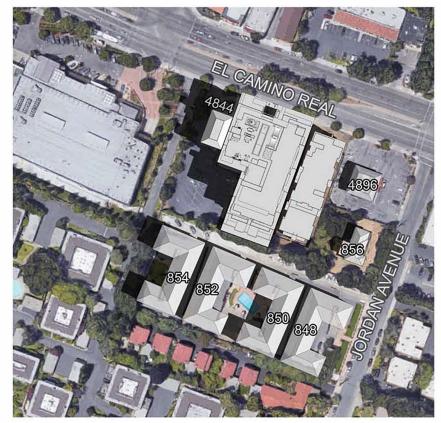


**EAST PERSPECTIVE** 

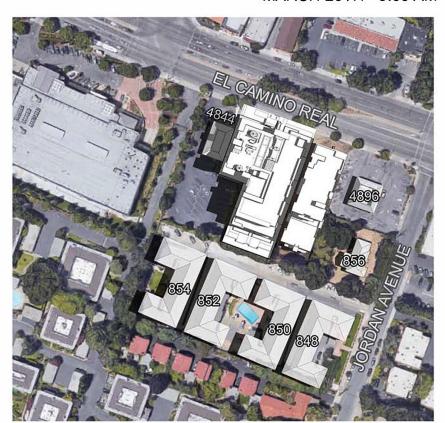
A L T O S O N E 4846 & 4856 El Camino Real Los Altos, CA July 18, 2018

L U X O N E L L C 572 Chimalus Dr. Palo Alto, CA 94306



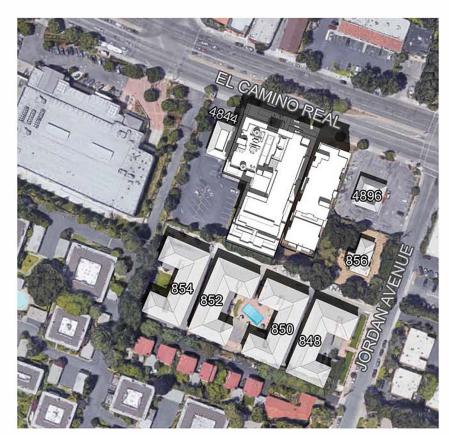


MARCH 20TH - 9:00 AM

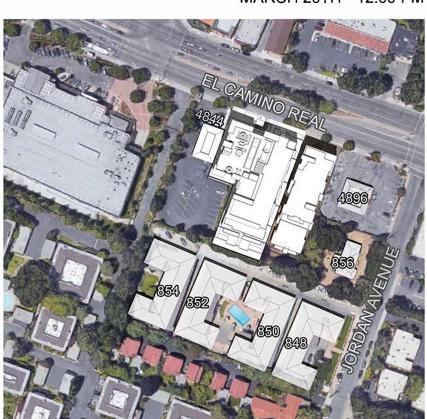


A L T O S O N E 4846 & 4856 El Camino Real Los Altos, CA July 18, 2018

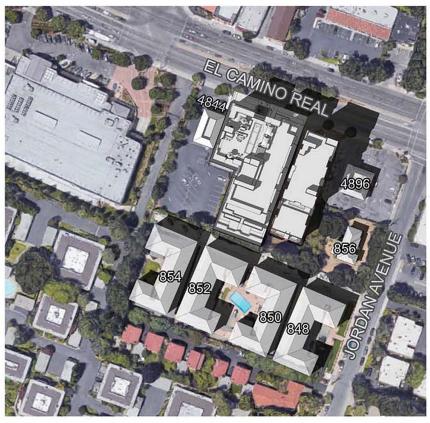
JUNE 21ST - 9:00 AM



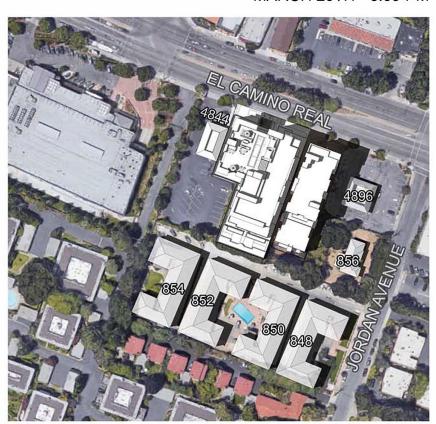
MARCH 20TH - 12:00 PM



JUNE 21ST - 12:00 PM



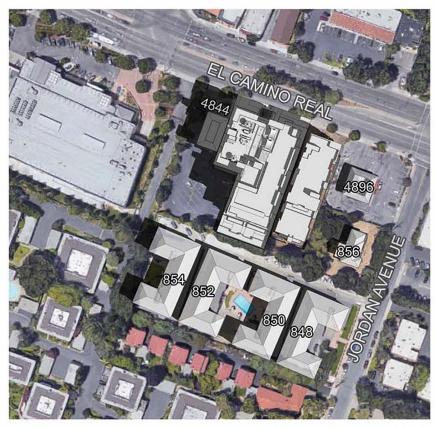
MARCH 20TH - 3:00 PM



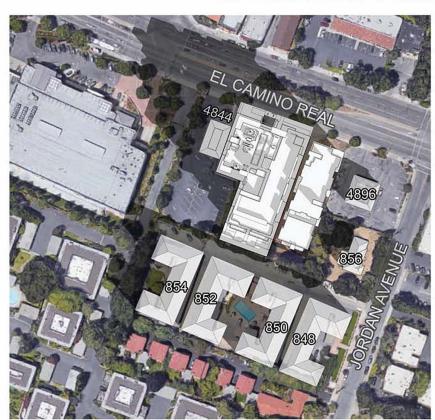
SCALE: 1" = 80'

JUNE 21ST - 3:00 PM

A37 SHADOW STUDY

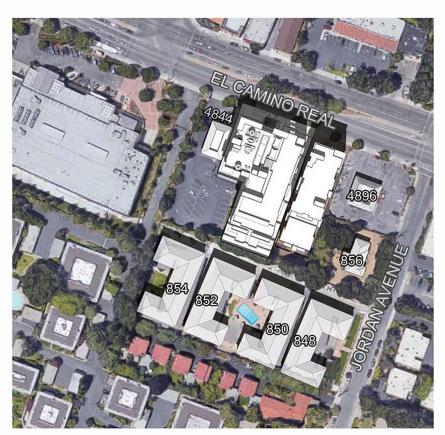


SEPTEMBER 23RD - 9:00 AM

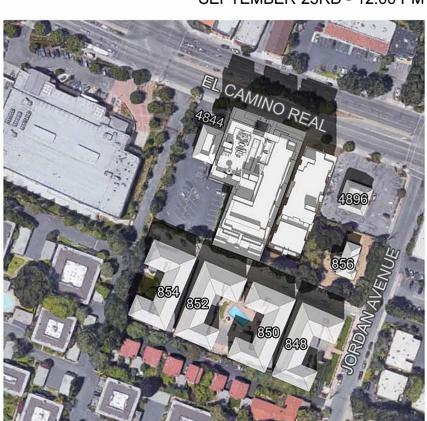


A L T O S O N E 4846 & 4856 El Camino Real Los Altos, CA July 18, 2018

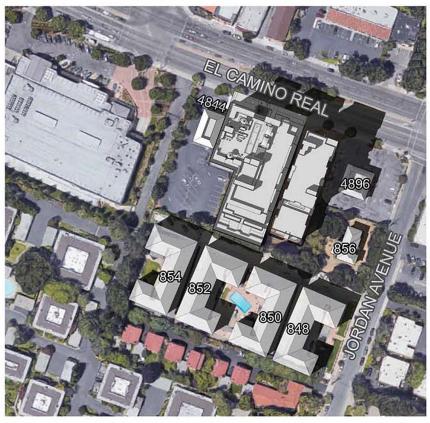
DECEMBER 21ST - 9:00 AM



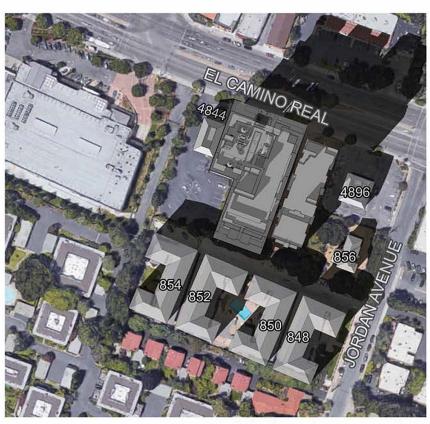
SEPTEMBER 23RD - 12:00 PM



DECEMBER 21ST - 12:00 PM



SEPTEMBER 23RD - 3:00 PM



SCALE: 1" = 80'

DECEMBER 21ST - 3:00 PM

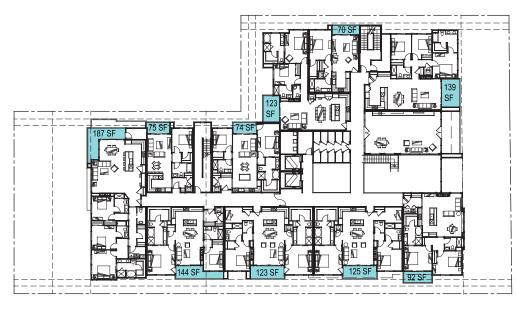
A38 SHADOW STUDY

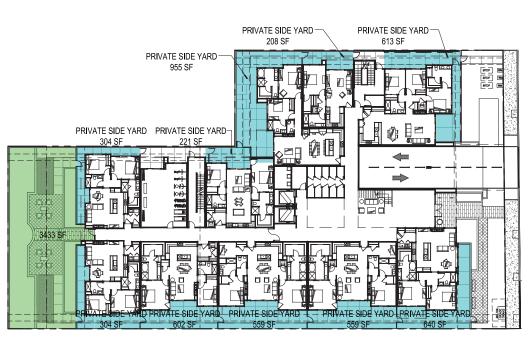


OPEN SPACE LEGEND

COMMON OPEN SPACE

PRIVATE OPEN SPACE





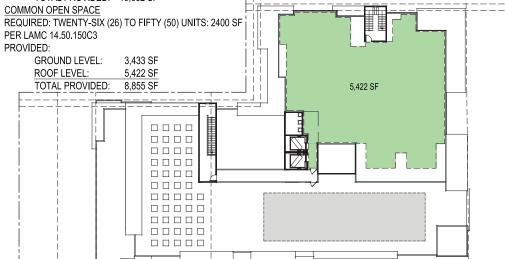
SECOND FLOOR FIRST FLOOR THIRD FLOOR

**OPEN SPACE** 

PRIVATE OPEN SPACE REQUIRED: 50 SF AVERAGE / UNIT X 50 UNITS = 2500 SF PER LAMC 14.50.150A PROVIDED:

FIRST FLOOR: SECOND FLOOR: 1,152 SF THIRD FLOOR: FOURTH FLOOR: FIFTH FLOOR:

1,187 SF 1,689 SF 1,689 SF TOTAL PROVIDED: 10,682 SF





FIFTH FLOOR **FOURTH FLOOR** 

ALTOS ONE 4846 & 4856 El Camino Real Los Altos, CA

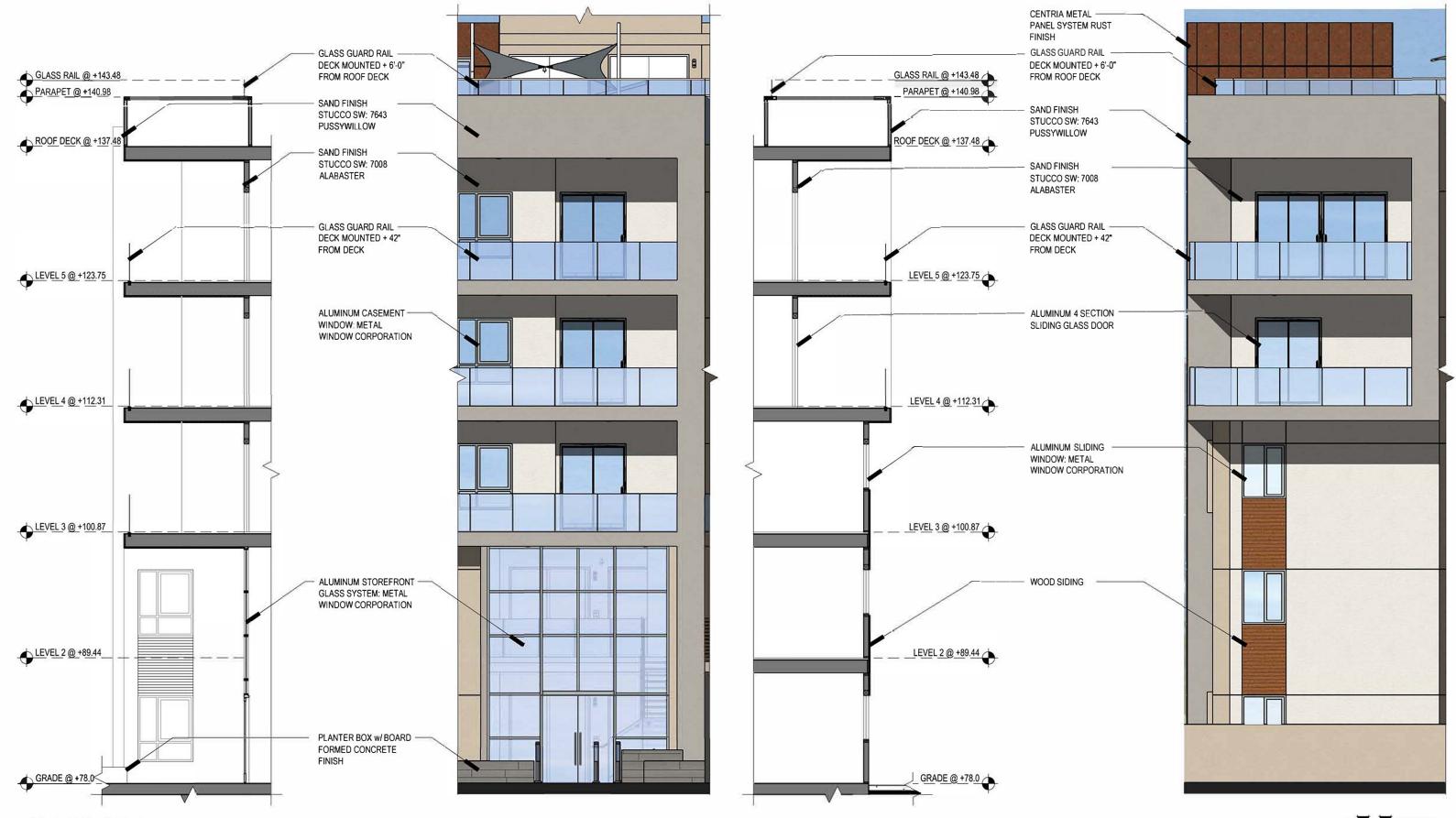
**ROOF** 

July 18, 2018

3361 Walnut Blvd. Suite 120 Brentwood, CA 94513 925.634.7000 www.straussdesign.com

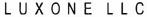
SDG Architects, Inc.

**OPEN SPACE** 



A L T O S O N E 4846 & 4856 El Camino Real

4846 & 4856 El Camino Real Los Altos, CA July 18, 2018



572 Chimalus Dr. Palo Alto, CA 94306





LUXONE LLC 572 Chimalus Dr. Palo Alto, CA 94306

3361 Walnut Blvd. Suite 120 Brentwood, CA 94513 925,634.7000

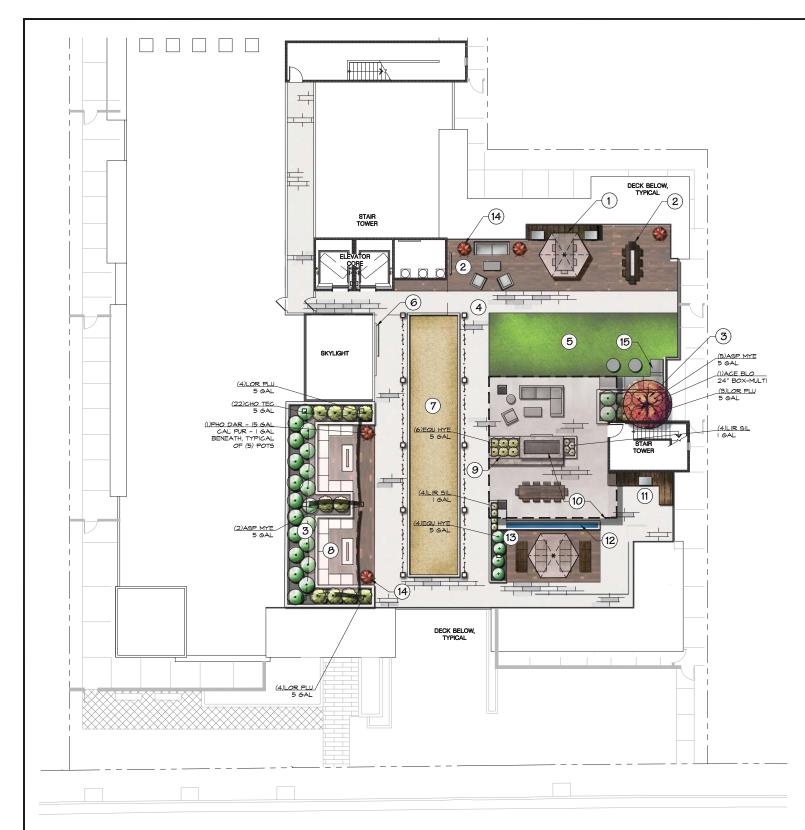


A L T O S O N E 4846 & 4856 El Camino Real

Los Altos, CA July 18, 2018



3361 Walnut Blvd. Suite 120 Brentwood, CA 94513 925,634.7000 www.straussdesign.com SDG Architects, Inc.



**EL CAMINO REAL** 

## **ROOF DECK** PRELIMINARY LANDSCAPE PLAN

NOT FOR CONSTRUCTION

APPLICATION NOS. 18-D-01, 18-UP-01, and 18-SD-01)

### PROGRAM AMENITY LEGEND

OUTDOOR KITCHEN:
BBQ GRILLS & BUILT-IN BAR SEATING WITH UMBRELLA ABOVE

2 ENTERTAINMENT NOOK: COUNTER HEIGHT TABLE SEATING WITH DROP-IN ICE CHEST AT CENTER. OUTDOOR TV FEATURE WALL, LOUNGE SEATING & WOOD PAVING. TYPICAL OF (2)

3 RAISED PLANTER WITH ACCENT TREES, & PLANTING

4 LARGE FORMAT PAVERS, TYPICAL

5) OUTDOOR SYNTHETIC TURF AREA, PICNIC VIEWING FOR OUTDOOR MOVIES

6 OUTDOOR MOVIE SCREEN

7) 12' X 60' BOCCE COURT WITH CONTEMPORARY FESTOON LIGHTS OVERHEAD

OUTDOOR LOUNGE AREA WITH SHADE SAIL ABOVE & RAISED PLANTER BEHIND BUILT-IN WOOD BENCH SEATING WITH FIREPIT AT CENTER. TYPICAL OF (2)

9 RAISED CORTEN STEEL PLANTER

(10) CABANA:

DOUBLE SIDED FIREPLACE WITH FARM TABLE DINING ONE SIDE, LOUNGE SEATING OTHER SIDE, APPROXIMATELY 28' X 32'

(11) OUTDOOR KITCHEN

(12) 42" HEIGHT TROUGH WATER FOUNTAIN

(13) SUN DECK:
RAISED 12" DECK WITH LOUNGE CHAIRS FUR SUN BATHING

(14) DECORATIVE POTTERY, TYPICAL

15) BUILT-IN BENCH FEATURE WITH COFFEE TABLES

KEY	BOTANICAL NAME	COMMON NAME	SIZE	SPACING .	WUCOLS (1		
	TREES	<del>'</del>	•	'			
ACE BLO*	Acer p. 'Bloodgood'	Bloodgood japanese Maple	24" BOX-STD.	SEE PLANS	м		
ACE SAN*	Acer p. 'Sango Kaku'	Coral Bark Maple	36" BOX-MULTI	SEE PLANS	М		
LAG MUS	Lagerstroemia i. 'Muskoqee'	Crape Myrtle	24" BOX-STD.	SEE PLANS	L		
LAU SAR*	Laurus nobilis 'Saratoga'	Saratoga Laurel	24" BOX-STD.	SEE PLANS	L		
LOP CON	Lophostemon confertus	Brisbane Box	24" BOX-STD.	SEE PLANS	М		
	SHRUBS, GROUNDCOVERS & GRASSES						
ANI BUS	Anigozanthus h. 'Bush Gold'	Kangaroo Pan	5 GAL	36" O.C.	L		
ASP ELA*	Aspidistra elatior	Cast-Iron-Plant	I GAL	18" O.C.	L		
ASP MYE*	Asparagus d. 'Myers'	Myers Asparagus Fern	5 GAL	30" O.C.	М		
AZA ALA*	Azalea x. 'Alaska'	White Azalea	5 GAL	48" O.C.	М		
CAL PUR	Calibrachoa x 'Purple'	Purple Million Bells	4" POTS	8" O.C.	М		
CHO TEC	Chondropetalum tectorum	Small Cape Rush	5 GAL	48" O.C.	L		
DIE VEG*	Dietes vegeta	Fortnight Lily	5 GAL	36" O.C.	L		
EVO SIL*	Evonymus j. 'Silver King'	Upright Evanymus	5 GAL	36" O.C.	L		
EQU HYM	Equisetum hymale	Horsetail	5 GAL	24" O.C.	Н		
FES ELI	Festuca g. 'Elijah Blue'	Common Blue Fescue	I GAL	18" O.C.	L		
LIR SIL*	Liriope m. 'Silvery Sunproof'	Varigated Lily Turf	I GAL	18" O.C.	М		
LOR PLU*	Loropetalum chinense 'Plum Delight'	Fringe Flower	5 GAL	42" O.C.	L		
NAN GUL*	Nandina d. 'Gulf Stream'	Dwarf Heavenly Bamboo	I GAL	24" O.C.	L		
PHO DAR	Phormium h. 'Dark Delight'	New Zealand Flax	15 GAL	36" O.C.	L		
PHO PLA	Phormium h. 'Platt's Black'	New Zealand Flax	5 GAL	36" O.C.	L		
PIT CRE*	Pittosporum t. 'Cream De Mint'	Pittosporum	5 GAL	30" O.C.	L		
PIT VAR*	Pittosporum tobira 'Variegata'	Variegated Tobira	5 GAL	48" O.C.	L		
POD MAK*	Podocarpus m. 'Maki'	Shrubby Yew Pine	15 GAL	42" O.C.	М		
SAR HUM*	Sarcococca hookeriana humilis	Sweet Box	15 GAL	36" O.C.	L		
TAX HIC*	Taxus x. media 'Hicksii'	Upright Yew	15 GAL	42" O.C.	М		
TRA JAS*	Trachelospermum jasminoides	Star Jasmine	5 GAL	42" O.C.	М		
MOO FIM*	Moodwardia fimbriata	Giant Chain Fern	5 GAL	48" O.C.	м		

NOTES:

1. WICOLS IV RATING ABOVE IS AN INDUSTRY STANDARD FOR IRRIGATION WATER NEEDS OF LANDSCAPE PLANTINGS IN SPECIFIC CALIFORNIA REGIONS. THE MAJORITY OF PLANTS FOR THIS REGION ARE VERY LOW (VL) TO Medium (M) WATER REQUIREMENTS AND PLANTED IN SPECIFIC HYDROZONES. ABBREVIATIONS FOR WICOLS WATER NEEDS ARE: VL - VERY LOW, L - LOW, M - MEDIUM, H - HIGH.

2. \* DENOTES SHADE TO LERANT PLANTS (I.E. SHADY CONDITIONS ALONG THE ADJACENT SOUTHEAST DEVELOPMENT AND UNDER THE EXISTING REDWOODS).









## TREE IMAGERY



Bloodgood Japanese Maple Acer p. 'Bloodgood'
Accent Tree,
Slow Growth to 20' H x 15' W



Acer p. 'Sango Kaku'
Accent Tree,
Moderate Growth to 20' H x 15' W



Crape Myrtle Lagerstroemia i. 'Muskogee'

Screen Tree,

Moderate Growth to 18' H x 10' W



Laurus n. 'Saratoga' Screen Tree, Moderate Growth to 20' H x 10' W



Brisbane Box Lophostemon confertus Street Tree, Moderate Growth to 35' H x 25' W

## SHRUB & GROUNDCOVER IMAGERY



Myers Asparagus Fern



White Azalea Azalea x. 'Alaska'



Purple Million Bells Calibrachoa x. 'Purple'



Small Cape Rush Chondropetalum tectorum



Fortnight Lily Dietes vegeta



Horsetail Equisetum hyemale



Upright Euonymus Euonymus j. 'Silver King'



Variegated Lily Turf Liriope m. 'Sllvery Sunproof'



Variegated Lily Turf Liriope m. 'Variegata'



Fringe Flower Loropetalum c. 'Plum Delight'



Dwarf Heavenly Bamboo Nandina d. 'Gulf Stream' Phormium t. 'Dark Delight'

New Zealand Flax





Pittosporum t. 'Cream De Mint'



Variegated Tobira Pittosporum t. 'Variegata'



Shrubby Yew Pine Podocarpus m. 'Maki' Screen Shrub, Moderate Growth to 9' H x 3' W



## SITE AMENITY IMAGERY



FIREPIT AREA - ROOF DECK PRECEDENT







BOARD FORM FINISH CONCRETE





OUTDOOR MOVIE SCREEN



CORTEN STEEL, RAISED PLANTER



LOUNGE CHAIR



OUTDOOR KITCHEN





WATER FEATURE









ROOF DECK - WOOD PAVING



WATER FEATURE



Sweet Box



Upright Yew Taxus x. media 'Hicksii'





Star Jasmine Trachelospermum jasminoides



Giant Chain Fern

ALTOS ONE 4856 & 4846 EL CAMINO REAL LOS ALTOS, CALIFORNIA 94022

NOTE: PLANTING CALLOUTS, REFER TO SHEET L-2 FOR PLANT LEGEND



DATE: 07/16/18 JOB# 16017.01



LANDSCAPE DESIGN IMAGES

~>· ~>· ~>

∭ CB

∭ JB

OSDMH

 $O_{SSMH}$ 

**ABBREVIATIONS** 

AGGREGATE BASE
ASPHALT CONCRETE
ACCESSIBLE
AREA DRAIN
BEGINNING OF CURVE
BEARING & DISTANCE
BENCHMARK

BOTTOM OF WALL/FINISH

CENTER LINE
CORRUGATED PLASTIC PIPE

(SMOOTH INTERIOR)
CLEANOUT
CLEANOUT TO GRADE
CONCRETE

CONSTRUCT or -TION CONCRETE CORNER

DIAMETER DROP INLET DUCTILE IRON PIPE

DUCTILE IRON PIPE
EACH
END OF CURVE
EXISTING GRADE
ELEVATIONS
EDGE OF PAVEMENT
EQUIPMENT
EACH WAY

EXISTING
FACE OF CURB
FINISHED FLOOR
FINISHED GRADE
FIRE HYDRANT
FLOW LINE
FINISHED SURFACE
GAS

HORIZONTAL

HIGH POINT HUB & TACK

HUB & TACK
INSIDE DIAMETER
INVERT ELEVATION
JUNCTION BOX
JOINT TRENCH
JOINT UTILITY POLE
LENGTH
LANDING

GAS
GAGE OR GAUGE
GRADE BREAK
HIGH DENSITY CORRUGATED
POLYETHYLENE PIPE

∭ CB

∭ JB

 $\bigcirc_{\mathrm{SDMP}}$ 

 $\bigcirc_{\text{SSMH}}$ 

ČPP

COTG CONC CONST CONC

GA GB HDPE

222.57 INV

CONCRETE VALLEY GUTTER FARTHEN SWALE AREA DRAIN CURB INLET STORM DRAIN MANHOLF FIRE HYDRANT STREET SIGN

SPOT ELEVATION FLOW DIRECTION DEMOLISH/REMOVE CONTOURS

TREE TO BE REMOVED

MAXIMUM MANHOLE

MONUMENT NEW NUMBER NOT TO SCALE ON CENTER

PLANTING AREA

PROPERTY LINE

POST INDICATOR VALVE
PUBLIC SERVICES EASEMENT

POWER POLE
PUBLIC UTILITY EASEMENT
POLYVINYL CHLORIDE

POLYVINYL CHLORIDE
RADIUS
REINFORCED CONCRETE PIPE
RIM ELEVATION
RAINWATER
RIGHT OF WAY

SLOPE SEE ARCHITECTURAL DRAWINGS SANITARY

STORM DRAIN STORM DRAIN MANHOLE

SEE LANDSCAPE DRAWINGS SPECIFICATION

SPECIFICATION
SANITARY SEWER
SANITARY SEWER CLEANOUT
SANITARY SEWER MANHOLE
STREET
STATION
STRUCTURAL
ETI EPILONE

TEMPORARY
TOP OF PAVEMENT
TOP OF WALL/FINISH GRADE
TYPICAL

TELEPHONE TOP OF CURB

VERTICAL

VERTICAL CURVE VITRIFIED CLAY PIPE

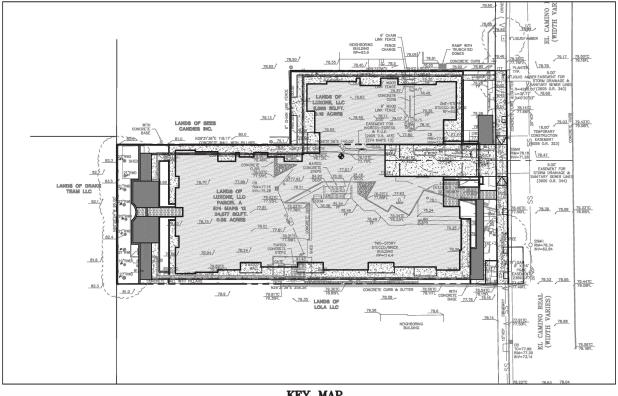
WATER LINE WATER METER WELDED WIRE FABRIC

OVER

PP PUE PVC

S.A.D.
SAN
SD
SDMH
SHT
S.L.D.
SPEC
SS
SSCO
SSMH
ST.
STA
STD
STRUCT

# 4846 & 4856 EL CAMINO REAL LOS ALTOS, CALIFORNIA



### KEY MAP 1" = 30'

SITE BENCHMARK

SURVEY CONTROL POINT

(NAVD 88)

### NOTES

ALL DISTANCES AND DIMENSIONS ARE IN FEET AND DECIMALS OF A FOOT.

UNDERGROUND UTILITY LOCATION

BUILDING FOOTPRINTS ARE SHOWN AT GROUND LEVEL.

FINISH FLOOR ELEVATIONS ARE TAKEN AT DOOR THRESHOLD (EXTERIOR)

### 4846 EL CAMINO REAL

EASEMENTS SHOWN ARE PER TITLE REPORT PREPARED BY FIRST AMERICAN TITLE COMPANY, ORDER NO. 4516—5620193, DATED JANUARY 18, 2018 AND EASEMENT DOCUMENT NO. 23893177. NOTE: EASEMENT DOCUMENT (K331 O.R. 1473) ADJUSTS THE EASEMENT SHOWN ON PARCEL MAP (574 MAPS 13) AND DESCRIBED IN DOCUMENT (K157 O.R. 1249)

## **EASEMENT NOTE**

ESTIMATED EARTHWORK QUANTITIES					
CUBIC YARDS	WITHIN BUILDING FOOTPRINT	OUTSIDE BUILDING FOOTPRINT	TOTAL CUBIC YARDS		
CUT	22,580	5	22,585		
FILL	0	0	0		
EXPORT			22,585		

GRADING QUANTITIES REPRESENT BANK YARDAGE. IT DOES NOT INCLUDE ANY SWELLING OR SHRINKAGE FACTORS AND IS INTENDED TO REPRESENT IN-SITU CONDITIONS. QUANTITIES DO NOT INCLUDE OVER-EXCAVATION, ITERNCHING, STRUCTURAL FOUNDATIONS OR PIERS, OR POOL EXCAVATION (IF ANY). NOTE ADDITIONAL EARTHWORKS, SUCH AS KEYWAYS OR BENCHING MAY BE REQUIRED BY THE GEOTECHICAL ENGINEER IN THE FIELD AT TIME OF CONSTRUCTION. CONTRACTOR TO VERIFY QUANTITIES.

## **BENCHMARK**

CITY OF MOUNTAIN VIEW BENCHMARK IV-25 BRONZE DISK STAMPED "IV-25" SET IN TOP OF CURB AT THE NORTH END OF THE NORTHWEST RETURN OF SHOWERS DR & EL CAMINO REAL. **ELEVATION** = 76.789

### 4856 EL CAMINO REAL

## **EASEMENT NOTE**

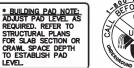
EASEMENTS SHOWN ARE PER TITLE REPORT PREPARED BY FIRST AMERICAN TITLE COMPANY, ORDER NO. 4316-5620193, DATED JANUARY 18, 2018 AND EASEMENT DOCUMENT NO. 23893177. NOTE: EASEMENT DOCUMENT

(K331 O.R. 1473)
ADJUSTS THE EASEMENT SHOWN ON PARCEL MAP (574 MAPS 13) AND

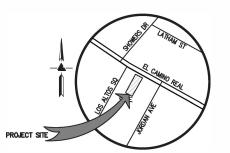
GENERAL NOTES:

1. DEMOLISH AND REMOVE ALL (E) IMPROVEMENTS AS NECESSARY FOR NEW CONSTRUCTION.

2. STREET LIGHTING WILL BE PROVIDED PER CITY OF LOS ALTOS' STANDARD SPECIFICATIONS (AS REQUIRED)







## **VICINITY MAP**

## OWNER'S ACKNOWLEDGMENT

I/WE HEREBY STATE THAT I/WE THE OWNER(S) OF THE LAND INCLUDED WITHIN THE SUBDIVISION SHOWN UPON THIS MAP AND I HEREBY AGREE TO THE FILING OF THIS TENTATIVE MAP AND AGREE TO COMPLY WITH THE PROVISIONS OF THE CITY OF LOS ALTOS COMPREHENSIVE PLAN AND STATE OF CALIFORNIA MAP ACT AS THEY APPLY TO THE PROCESSING AND APPROVAL OF SAID MAP. THE CURRENT ZONING FOR THIS PROPERTY IS R3-1.8, ALL IMPROVEMENTS SHALL BE MADE IN ACCORDANCE WITH CITY OF LOS ALTOS/UTILITY DISTRICT STANDARDS.

AS OWNER: LUXONE LLC

BY: LUXONE LLC DATE:\_

## OWNER'S INFORMATION

LUXONE LLC 572 CHIMALUS DRIVE

APN: 170-02-029 AND 170-02-27

### REFERENCES

THIS GRADING AND DRAINAGE PLAN IS SUPPLEMENTAL TO:

1. TOPOGRAPHIC SURVEY BY LEA & BRAZE ENGINEERING,
INC. ENTITLED:

"TOPOGRAPHIC SURVEY"
4846 & 4856 EL CAMINO REAL
LOS ALTOS, CA DATED: 5-16-16 JOB#: 2160409

2. SITE PLAN BY SDG ARCHITECTS, INC. ENTITLED: "CONCEPTUAL SITE PLAN"
4846 & 4856 EL CAMINO REAL
LOS ALTOS, CA

3. LANDSCAPE PLANS BY ENVIRONMENTAL INSIGHT, INC. ENTILED:

ITTLED:
"LANDSCAPE PLAN"
4846 & 4856 EL CAMINO REAL

THE CONTRACTOR SHALL REFER TO THE ABOVE NOTED SURVEY AND PLAN, AND SHALL VERIFY BOTH EXISTING AND PROPOSED ITEMS ACCORDING TO THEM.

### PROJECT DATA

TRACT NO.

RECORD OWNER(S)/ SUBDIVIDERS: LUXONE LLC 572 CHIMALUS DRIVE PALO ALTO, CA 94306

LEA & BRAZE ENGINEERING INC. 2495 INDUSTRIAL PARKWAY WEST HAYWARD, CO. 94545 (510) 887-4086 CONTACT: PETE CARLINO

50 RESIDENTIAL UNITS UNIT COUNT: ASSESSOR'S PARCEL NO. 170-02-029 AND 170-02-27

UTILITIES SERVICES:

CAL WATER CITY OF LOS ALTOS PG&E AT&T GAS & ELECTRICAL: TELEPHONE:

COMCAST CITY OF LOS ALTOS STORM DRAIN:

## **PROJECT**

## DESCRIPTION/IMPROVEMENTS

CONSTRUCTION OF A NEW MULTIFAMILY RESIDENTIAL

### UNIT COUNT

50 RESIDENTIAL UNITS

## SHEET INDEX

TITLE SHEET TENTATIVE MAP GRADING & DRAINAGE PLAN

STORMWATER CONTROL & UTILITY PLAN STORMWATER CONTROL DETAILS TM-3.1 TOPOGRAPHIC SURVEY

TOPOGRAPHIC SURVEY

01 OF 07 SHEETS

PLANNING REVIEW - NOT FOR CONSTRUCTION



ONE CAMINO REAL MALIFORNIA

S 呂  $A L T \bigcirc$  & 4856 | ALTOS,  $\bigcirc$ &  $\Omega$ 4846 10

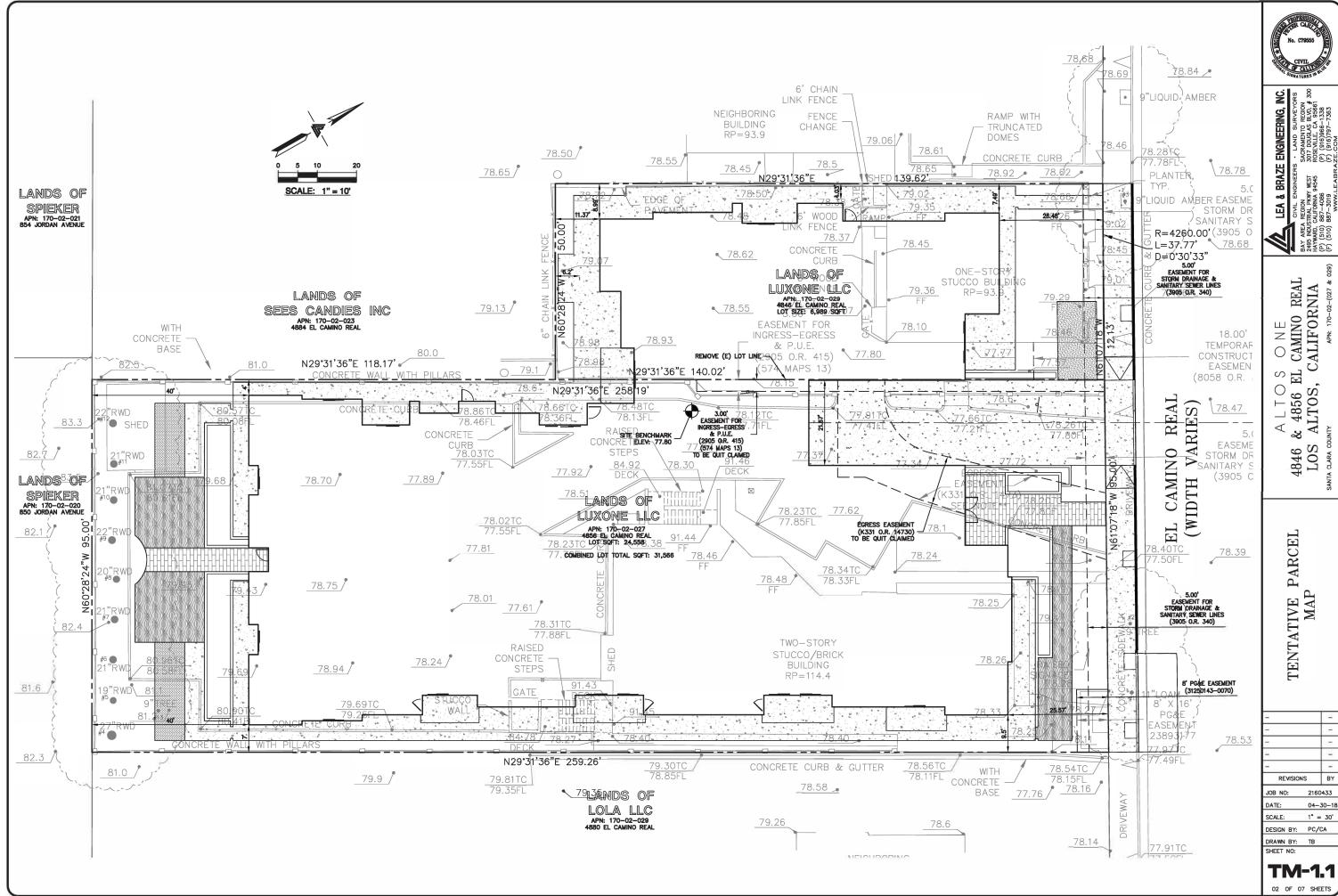
> SHEET TITLE

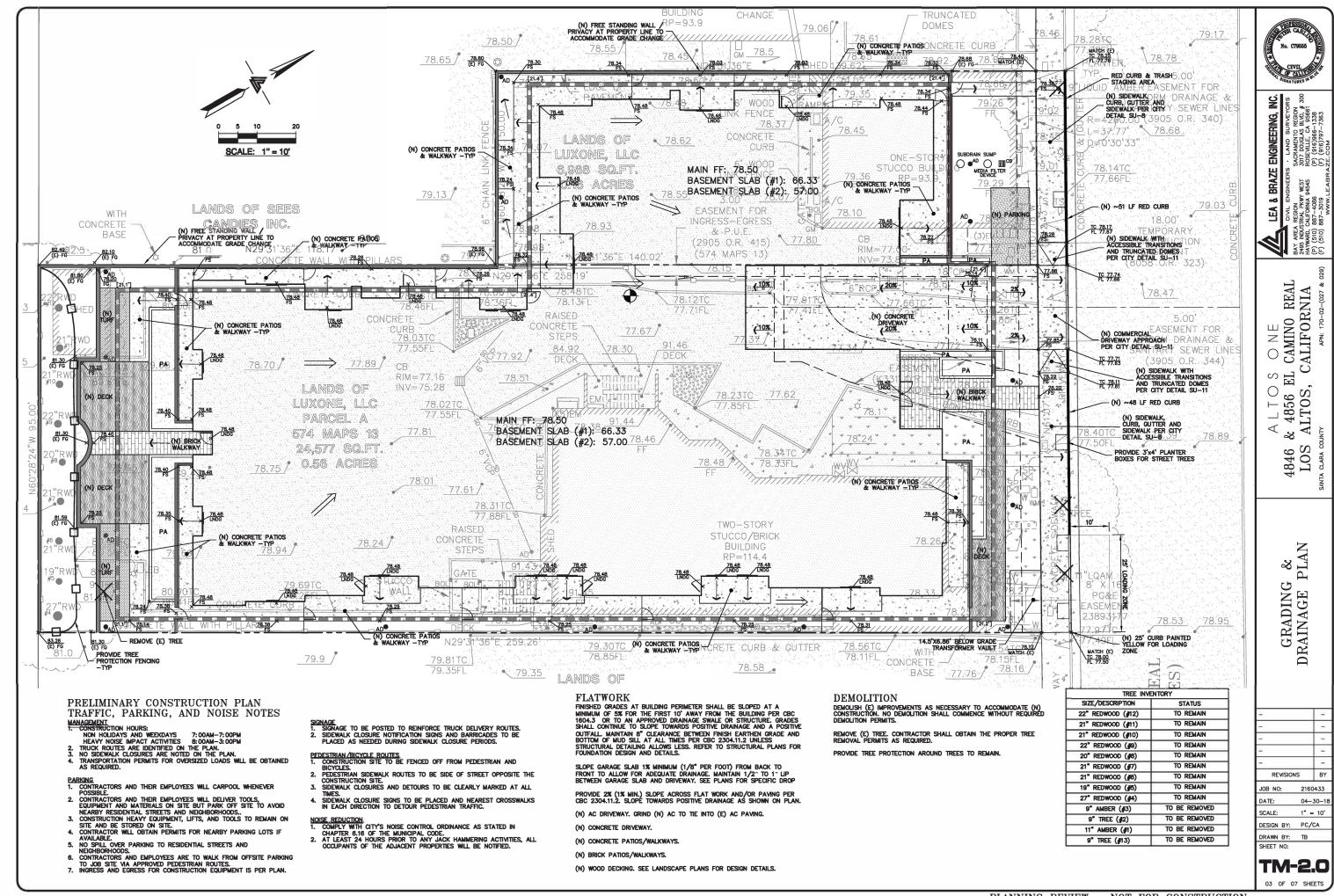
REVISIONS BY 2160433

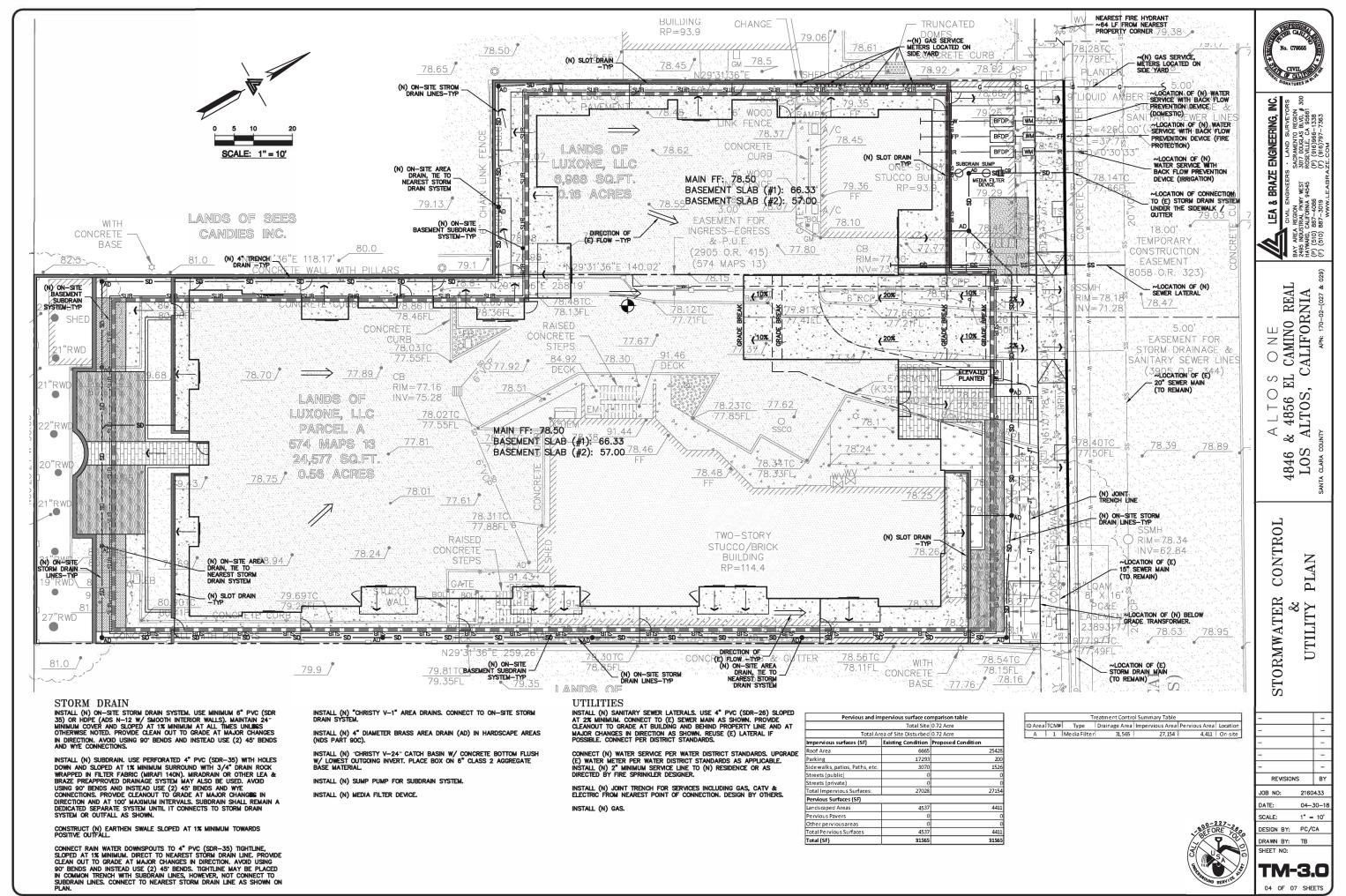
JOB NO: 04-30-18

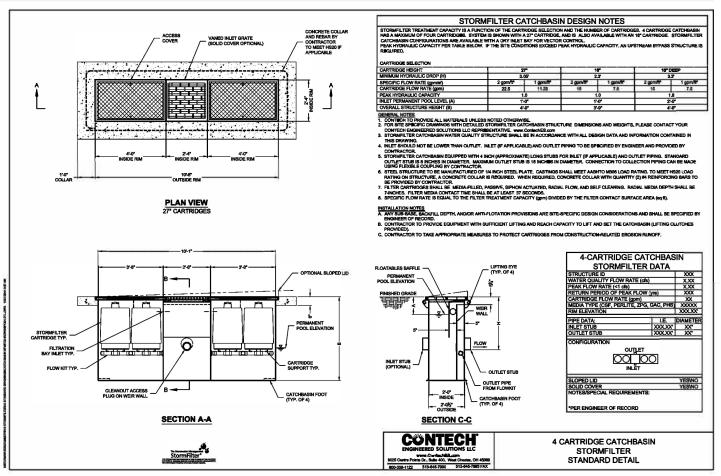
DATE: SCALE: 1" = 30' DESIGN BY: PC/CA DRAWN BY: TB

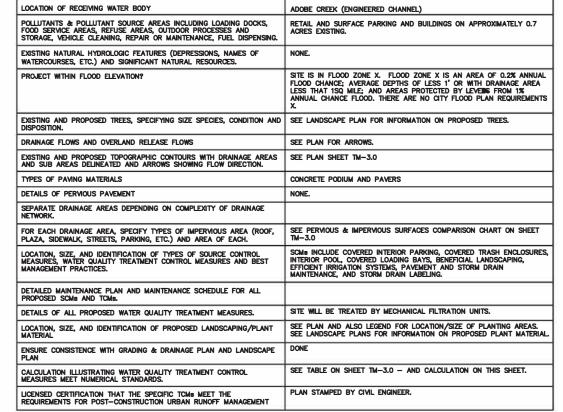
SHEET NO: TM-1.0











STORMWATER FILTER UNIT SIZING (SITE)
THE FOLLOWING STEPS FOR SIZING THE PROPOSED STORMFILTER UNITS ARE TAKEN FROM THE PRODUCT
DESIGN GUIDELINES BY CONTECH INC. STORMWATER MANAGEMENT INC. (PRODUCT MANUFACTURER). THE
RATIONAL METHOD INFORMATION CONTAINED IN STEP 1 IS BASED ON THE METHODLOGY PROVIDED BY THE
SANTA CLARA VALLEY RUNOFF POLUTION PREVENTION PROGRAM FOR CALCULATING TREATABLE FLOW RATES.

DETERMINE THE NUMBER OF CARTRIDGES FOR A HIGHLY DRAINAGE AREA (>75% IMPERVIOUS)

TOTAL DRAINAGE AREA

CALCULATE THE TREATABLE FLOW RATE FROM THE WATER QUALITY STORM (Q-treat) FOR THE SITE. USE THE RATIONAL METHOD TO SOLVE FOR Q.

 $\begin{array}{lll} \textbf{Q} &=& \text{CIA} \\ \textbf{C} &=& 0.9 \text{ (PAVED SURFACE RUNOFF COEFFICIENT)} \\ \textbf{I} &=& 0.2 \text{ (RAINFALL INTENSITY, INCHES/HOUR)} \\ \textbf{A} &=& 0.7 \text{ ACRES} \\ \textbf{Q} &=& 0.9 \text{ X} \cdot 0.2 \text{ X} \cdot 0.7 \\ \textbf{Q} &=& 0.13 \text{ CFS} \end{array}$ 

STEP 2

CALCULATE THE NUMBER OF CARTRIDGES REQUIRED TO TREAT THE PEAK WATER QUALITY FLOW RATE (N-flow) FOR THE SITE.

N-flow = Q-treat (449gpm/cart, WHICH IS THE MAXIMUM FLOW RATE THAT AN INDIVIDUAL CARTRIDGE CAN TREAT.

IF THE NUMBER OF CARTRIDGES IS NOT A WHOLE NUMBER, ROUND THE NUMBER OF CARTRIDGES UP TO THE NEXT WHOLE NUMBER. N—flow = (0.13 CFS) X (449 gpm/cart / 12.50 gpm/cart) N—flow = 4.68 = 5 CARTRIDGES

STEP 3

CALCULATE THE FLOW RATE FROM 10 YEAR STORM. USE THE RATIONAL METHOD TO SOLVE FOR Q.

C = 0.9 (PAVED SURFACE RUNOFF COEFFICIENT)
I = 2.0 (RAINFALL INTENSITY PER CPC, INCHES/HOUR)
A = 0.7 ACRES
Q = 0.9 X 2.0 X 0.7

Q = 1.26 CFS (TOTAL FLOWRATE)

## BEST MANAGEMENT PRACTICES

CONSTRUCTION BMP'S MAY INCLUDE, BUT ARE NOT LIMITED TO, SILT FENCE/STRAW WADDLES AROUND PERIMETER OF SITE FOR SEDIMENT CONTROL, REGULAR STREET CLEANING, AND INLET PROTECTION DURING CONSTRUCTION.

## STORMWATER TREATMENT STATEMENT

THIS PROJECT IS A TYPICAL MID-RISE URBAN INFILL SITE WITH HIGH DENSITY REQUIRED BY THE CITY'S GENERAL PLAN. 93% OF THE SITE IS PRESENTLY IMPERVIOUS. THE USE OF BELOW GROUND MECHANICAL STORMWATER TREATMENT UNITS SUCH AS THOSE MANUFACTURED BY CONTECH INC., MAY BE USED FOR THIS PROJECT. ALL STORMWATER RUNOFF FROM THIS PROJECT, INCLUDING THE ROOF COLLECTED WATER A GROUND LEVEL RUNOFF, WILL BE TREATED BEFORE IT ENTERS THE COLLECTION SYSTEM.

THE PROPOSED MIXED USE PROJECT WILL INCREASE THE AMOUNT OF IMPERVIOUS SURFACES AND RUNOFF QUANTITY.



TRING, I URVEYOR REGION BLVD, # 1338 1338 7363

SACA 3017 (P) (P)

WEST 94545 REGIC TRIAL SALIFO 887— 887—

ONE CAMINO REAL MALIFORNIA S

 $\bigcirc$ 

 $A L T \bigcirc$  & 4856 l ALTOS,  $\mathbf{\Omega}$ 4846 LOS

ಷ

CONTROL DETAILS ATER STORMW

REVISIONS JOB NO: 2160433 04-30-18 DATE: 1" = 10' SCALE:

DESIGN BY: PC/CA DRAWN BY: TB SHEET NO:

TM-3.1 05 OF 07 SHEETS

## CONSTRUCTION MANAGEMENT PLAN

4846 & 4855 EL CAMINO REAL LOS ALTOS CA JULY 1, 2012

### ACKNOWLEDGEMENT

THE GOAL OF THIS CONSTRUCTION MANAGEMENT PLAN IS TO MINIMIZE CONSTRUCTION RELATED IMPACTS TO THE SURROUNDING NEIGHBORHOOD AND ADJACENT PROPERTIES AND THEIR OCCUPANTS. SPECIFICALLY, THE OBJECTIVES OF THIS PLAN ARE TO:

- REDUCE PARKING IMPACTS RELATED TO THE PROPDSED CONSTRUCTION;
- CONTAIN CONSTRUCTION RELATED PARKING TO PROJECT SITE AND AREAS APPROVED BY THE CITY;
- REDUCE CONSTRUCTION NOISE IMPACTS TO THE GREATIST EXTENT TECHNICALLY AND ECONOMICALLY FEASIBLE;
- AND MINIMIZE OFF-SITE DUST AND AIR QUALITY IMPACTS PER BEST MANAGEMENT PRACTICES.

IN ORDER TO ACHIEVE THE ABOVE STATED GOAL AND OBJECTIVES, WE AGREE TO, AND WILL ABIDE BY, THE TERMS CONTAINED IN THIS CONSTRUCTION MANAGEMENT PLAN.

OWNER, 4846 & 4855 EL CAMINO REAL

DATE

### 4846 & 4856 ECR Project Los Altos, CA.

APPROVALS

"31"36"E 118.17"

ENGINEERING DIVISION

PLANNING DIVISION

BUILDING DIVISION

work to the maximum extent possible.

### Noise Reduction Plan

Luxone LLC has developed this noise reduction plan to reduce the construction noise impact on the surrounding neighbors. The project Superintendent will be the designated on site responsible party and will not still authority in any required action necessary to emorce compliance of this plan. This plan outlines general practices to be followed to reduce the noise impact caused by our construction activity.

- Construction hour shall be 7:50 AM, to 4:00 PM, As out lined by the City of Los Altos.
   All construction fools and equipment must be in good running orders othat they.
- operate at normal manufacturer's operation specifications, including at peak loading.

  2. All construction equipment being operated on after must be equipped with the appropriate manufacturer's noise reduction devise(s) including but not limited to a
- multilenthat is tree of rust, holes, and exhaust leaks.

  4. The project superintendent shalf mitigate noise from construction devices with internal combustion engines by ensuring that the engines housing doors are kept closed or as recommended by the maintracturer significant or proper engine operation or
- exhaust.

  S. Reduce Equipment noise by operating the device at lower engine speeds during the
- 5. Vehicle and equipment engine id ling on site shall be limited to 5 minutes when
- gractical.

  7. Whenever practical the smallest tool one quipment shall be used they tend to be
- quiet er.
- 3. The positioning and operation of dump truck shall be reviewed to reduce the use of back up alarms.
- Slamming of dump truck tailgates shall be avoided to the axtent gossible to prevent unreasonable noise.
- 30. At least 24 Hrs. prior to any jack-hammering activities, all occupants of a djacent properties will be notified.
- 11. All equipment shall be properly maintained and all moving partishall be well lubrisated for proper operation and televoid unnecessary holds from aqueaking parts.
- .12. Stool Plates shall be installed on the stroot surface in a way that creates a smooth transition from pavement to the plate surface and to keep the plates tirmly in place and reduce the holise as well class cross over it.
- 18. Wedges or other similar devices shall be used to prevent steel plates from rocking or shifting.
- 14. Asphalt cold-patch shall be applied when teasible around the edges of the steel plate's to minimize weblake tire impact on the plates and to help keep the plates in place.

## NOTES:

N29"31"36"E 259.28

1. PROVIDE TEMPORARY CONSTRUCTION ENTRANCE, THE SITE SHALL HAVE A TEMPORARY CONSTRUCTION DRIVEWAY OF BASE ROCK, OR ALTERNATE MATERIAL APPROVED BY THE ENGINEERING DEPARTMENT, BEGINNING AT THE EDGE OF PAVEMENT AND EXTENDING TO A POINT ON—SITE TO REDUCE DUST AND MUD TRACKING. SIGNS, DELINEATORS, AND FLAG PERSONS SHALL BE AVAILABLE ON—SITE IF NECESSARY. IF AN EXISTING PAVED DRIVEWAY IS MAINTAINED DURING CONSTRUCTION, A TEMPORARY ACCESS WILL NOT BE REQUIRED.ENSURE SOIL AND DEBRIS DOES NOT ENTER THE CITY RIGHT OF WAY. PROVIDE STREET SWEEPING AS REQUIRED.

2. CONSTRUCTION TRAILER (ESTIMATED SIZE 8FT X 20FT) — FINAL LOCATION SHALL BE CONFIRMED BY CONTRACTOR AT THE TIME OF PLACEMENT.

3. SANITARY FACILITIES — THE TEMPORARY SANITARY FACILITIES SHALL BE PLACED OUT OF VIEWS OF ADJACENT NEIGHBORING PROPERTIES. THE FACILITIES SHALL BE ABLE TO BE ACCESSED FROM A PAVED OR ROCKED ROAD OR DRIVEWAY. THE SANITARY FACILITIES MAY NOT BE LOCATED IN THE PUBLIC RIGHT OF WAY.

4 4. PROVIDE TEMPORARY POWER SOURCE, COORDINATE WITH PG&E FOR FINAL LOCATION.

5 5. CONSTRUCTION MATERIALS STORAGE — AN AREA SHALL BE DESIGNATED ON—SITE FOR THE STORAGE OF CONSTRUCTION MATERIALS.

6. DEBRIS BOX - A DEBRIS BOX SHALL BE PLACED ON-SITE FOR COLLECTION OF CONSTRUCTION DEBRIS. ARRANGEMENTS MUST BE MADE WITH THE LOS ALTOS GARBAGE COMPANY FOR THE DEBRIS BOX, SINCE THEY HAVE A FRANCHISE WITH THE TOWN AND NO OTHER HAULER IS ALLOWED WITHIN THE TOWN LIMITS. THE DEBRIS BOX SHOULD BE ACCESSIBLE FROM A PAVED OR ROCKED ACCESS ROAD.

7. CLEAN-UP AREA - WHEN ON-SITE CLEANING OF EQUIPMENT IS REQUIRED FOR CEMENT FORMS AND TRUCKS, PAINT BRUSHES, PLASTERING TOOLS, AND SUCH, THEN A CLEAN-UP AREA MUST BE SPECIFIED AND POSTED WITH A SIGN. THIS AREA MUST NOT BE LOCATED BENEATH ANY TREE'S CANOPY OR IN ANY PROPOSED PLANTING AREA. RUN OFF FROM THE CLEAN-UP AREA CAN BE CONTAINED BY PROVIDING A TEMPORARY BASE OF WOOD CHIPS OR OTHER NATURAL ABSORBENT MATERIAL TO BE DISPOSED OF OFF SITE.

ALTOS ONE

ALTOS, CALIFORNIA

LOS ALTOS, CALIFORNIA

(1) (310) 897-3019

(1) (310) 897-3019

(1) (310) 897-3019

(1) (310) 897-3019

(2) (310) 897-3019

(3) (310) 897-3019

(4) (310) 897-3019

(5) (310) 897-3019

(7) (310) 897-3019

PRELIMINARY CONSTRUCTION MANAGEMENT PLAN

**CMP 1**02 OF 02 SHEETS

## 4846 & 4856 E**G**A Project

Material Delivery Plan

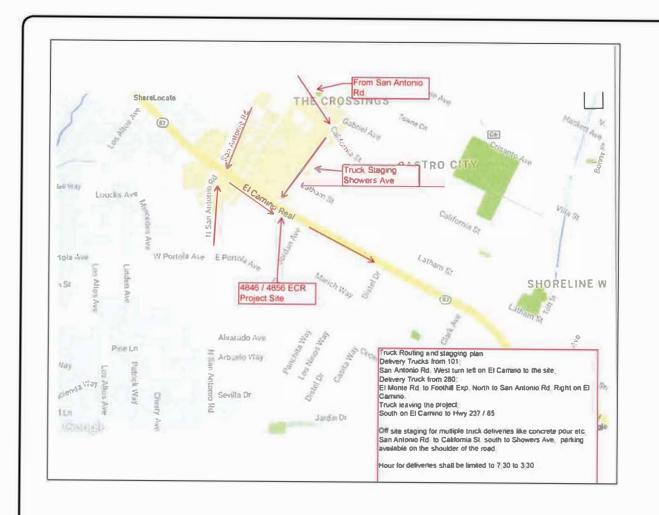
Lixone LLE has developed this material delivery plan to reduce the construction traffic impact on the surrounding neighbors. The project Superintendent will be the designated on site resignable party and will nast uil authority in any required action necessary to entorce compliance of this plan. This plan outlines general practices to be relieved to reduce the construction traffic caused by our construction activity.

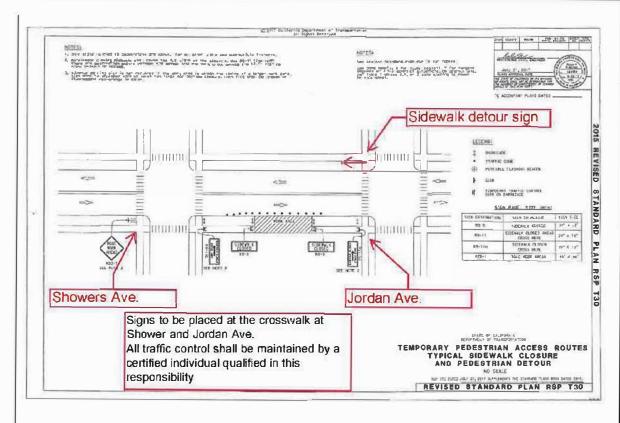
- 1. When possible all deliveries shall be completed before 10:00 am.
- All delivery trucks shall strictly adhere to the designated routes as shown on the Truck Route map.
- Whenever possible deliver full loads to eliminate multiple deliveries or the same materials.
- Schepuls deliveriesso that multiple trucks do not show up at the same time and cause interference with normal flow of local trattic.
- When delivered are scheduled make sure the site is ready forthe materials and that
  the appropriate traffic control is in place to minimite the union ding and presents of the
  truck at the SRs.

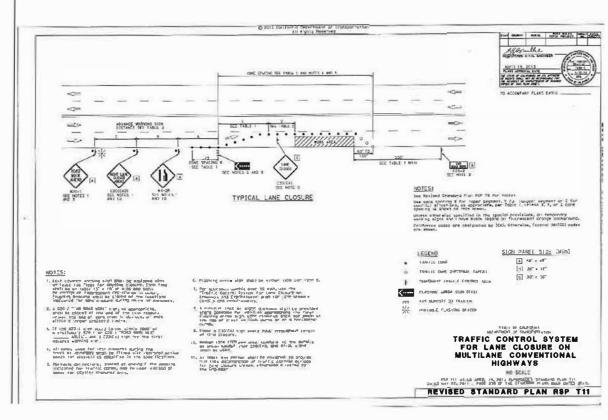
### Construction Site Parking and Staging Plan

Luxone LLC has developed this Construction Site Parking and Staging Plan to reduce the construction impact on the surrounding neighbors. The protect Superintendent will be the designated on site responsible party and will has tull authority in any required action recessary to entorce compilance of this plan. This plan outlines general practices to be followed to reduce the construction impact on the surrounding neighbors.

- I. Ouring the basement executation and construction there will be an average of 10 vehicles associated with this phase of construction. Parking for this phase will be limited to the project trontage on El Camino and across the street on El mino.
- 2. Ouring vertical construction it is anticipated that there will be an average of 30 vehicles to support this phase of construction. Upon completion at the basement parking structure, the parking structure shall be used for employee parking and materials such as the plumber's piges and fittings and electric lans wire and boxes.
- 3. We anticipal tethe construction office trailer to be 3'  $\times$  20' and that there will be one other storage unit of similar size 2  $\times$  20. See plan sheet for the locations.
- Construction rending shall consist of a temporary tende on blocks approximately 6' tall
  with a green screen. Access to the site will be by one gate lecated at the building ramp.
- Material staging area shall be located on site as shown on the construction management Bian.







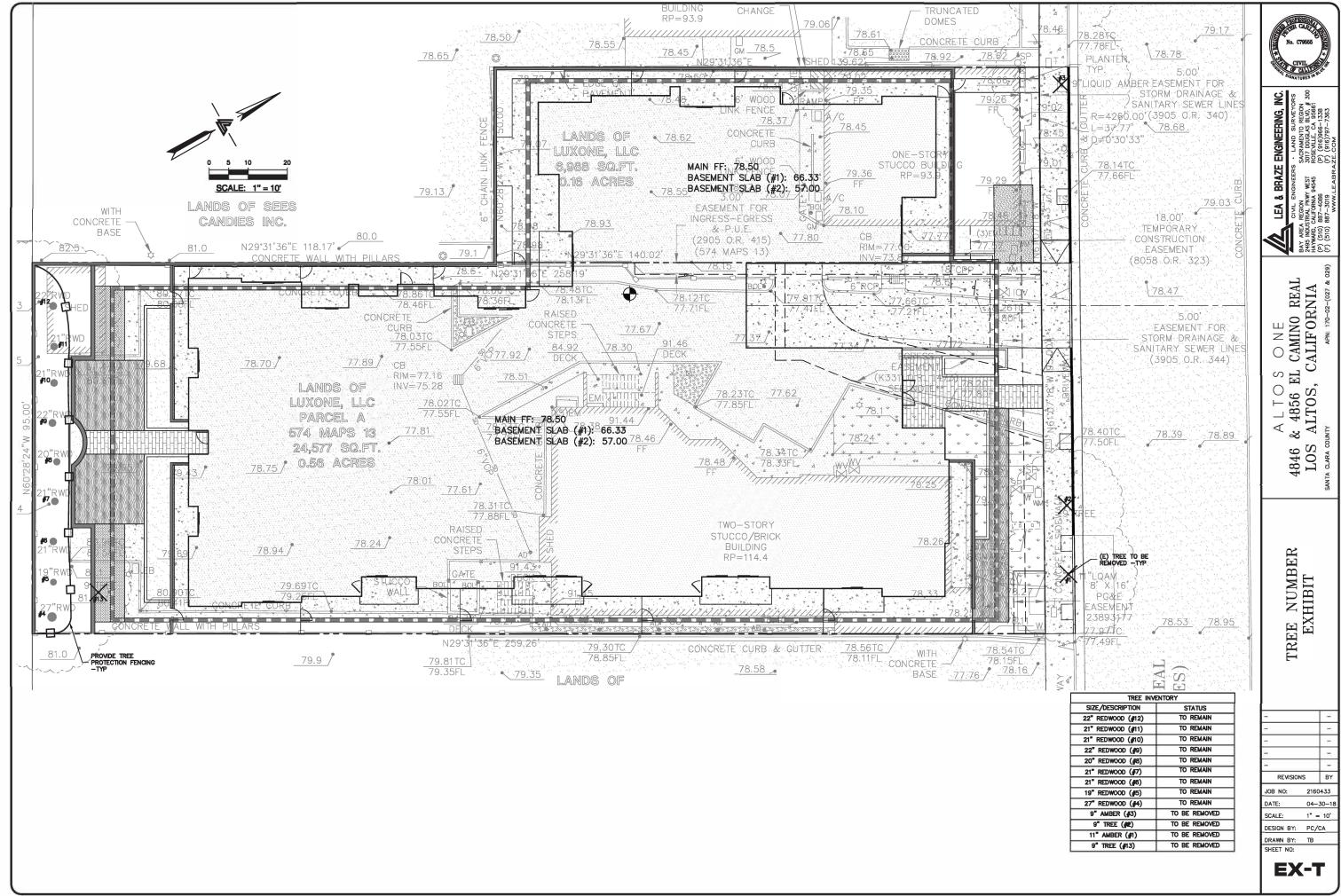
4846 & 4856 EL CAMINO REAL LOS ALTOS, CALIFORNIA

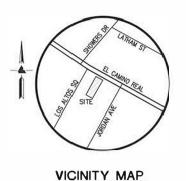
A REGON USTRAL PKWY WEST CALLFORMA 94545 B87-4086 887-3019 WWWYLE ARR

BAY AREA 2445 BOUST HAYWARD, (P) (SIO) (F) (SIO)

PRELIMINARY CONSTRUCTION MANAGEMENT PLAN







## NOTES

ALL DISTANCES AND DIMENSIONS ARE IN FEET AND DECIMALS OF A FOOT.

UNDERGROUND UTILITY LOCATION IS BASED ON SURFACE EVIDENCE.

BUILDING FOOTPRINTS ARE SHOWN AT GROUND LEVEL.

FINISH FLOOR ELEVATIONS ARE TAKEN AT DOOR THRESHOLD (EXTERIOR)

## **♦** SITE BENCHMARK

SURVEY CONTROL POINT
MAG AND SHINER SET IN ASPHALT
ELEVATION = 77.80'
(NAVD 88)

### EASEMENT NOTE

EASEMENTS SHOWN ARE PER TITLE REPORT PREPARED BY FIRST AMERICAN TITLE. COMPANY, ORDER NO. 4316—5620193, DATED JANUARY 18, 2018 AND EASEMENT DOCUMENT NO. 23893177. NOTE: EASEMENT DOCUMENT NO. 23893177.
NOTE: EASEMENT DOCUMENT
(K331 O.R. 1473)
ADJUSTS THE EASEMENT SHOWN ON PARCEL MAP (574 MAPS 13) AND
DESCRIBED IN DOCUMENT (K157 O.R. 1249)

## **BENCHMARK**

CITY OF MOUNTAIN VIEW BENCHMARK IV-25 BRONZE DISK STAMPED "IV-25" SET IN TOP OF CURB AT THE NORTH END OF THE NORTHWEST RETURN OF SHOWERS DR & EL CAMINO REAL ELEVATION = 76.789'

SCALE: 1" = 16'



BRAZE

REAL

48

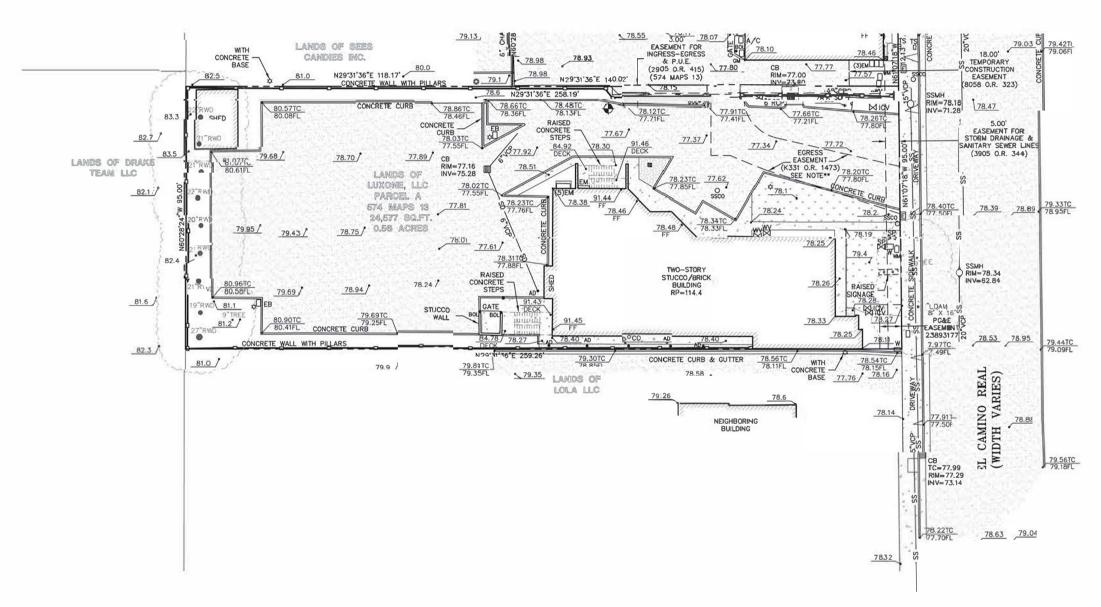
EL CAMINO LOS ALTOS CALIFORNIA 9 5

FOPOGRAPHIC STIDVEV

PG&E EASEMENT/ MT NEW TR 05-08-18 TREE UPDATE CA REVISIONS JOB NO: DATE: 5-16-16 1" = 16' SCALE:

FIELD BY: EH DRAWN BY: DB SHEET NO:

SU1



## LEGEND AND NOTES

			LEGEND AND	INOTEO			
	BOUNDARY LINE	□ ∈в	ELECTRICAL BOX	OSSMH	SANITARY SEWER MANHOLE	O w	WATER VAULT
	- EASEMENT	□ EM	ELECTRICAL METER	D4 SP	SPRINKLER SYSTEM VALVE	XXX,XX	SPOTGRADE
x	- FENCE LINE	□ε	ELECTRICAL VAULT	OSP	STANDPIPE	CONTRACTOR OF THE PARTY OF THE	
ss	SANITARY SEWER LINE	FF	FINISH FLOOR	<b>\$</b>	STREET LIGHT	-3177757	ASPHALT
SD	STORM DRAIN LINE	×	FIRE HYDRANT	0	STREET LIGHT W/ CONCRETE BASE	* * * * *	
□a/c	AIR CONDITIONING UNIT	FL	FLOW LINE		STREET SIGN	* 100	CONCRETE
*AD	AREA DRAIN	INV	INVERT	□т	TELEPHONE BOX	parametrical parameters.	
<b>*</b>	BENCHMARK	MICV	IRRIGATION CONTROL VALVE	TC	TOP OF CURB		GRAVEL
*BOL	BOLLARD	LQAM	LIQUID AMBER	□ TS	TRAFFIC SIGNAL BOX	A. 161. N.	
Ш св	CATCH BASIN		PILLAR, SIMILAR	VCP	VITRIFIED CLAY PIPE	101010	LAWN
°C0	CLEAN-OUT BOX	RWD	REDWOOD	□wм	WATER METER		
CPP	CORRUGATED PLASTIC PIPE	RP	ROOF PEAK	⋈ wv	WATER VALVE	00000000	PAVERS
		OSSCO	SANITARY SEWER CLEAN-OUT				

VICINITY MAP

NO SCALE

## **NOTES**

ALL DISTANCES AND DIMENSIONS ARE IN FEET AND DECIMALS OF A FOOT.

UNDERGROUND UTILITY LOCATION IS BASED ON SURFACE EVIDENCE.

BUILDING FOOTPRINTS ARE SHOWN AT GROUND LEVEL.

FINISH FLOOR ELEVATIONS ARE TAKEN AT DOOR THRESHOLD (EXTERIOR)

## SITE BENCHMARK

SURVEY CONTROL POINT
MAG AND SHINER SET IN ASPHALT
ELEVATION = 77.80'
(NAVD 88)

## **EASEMENT NOTE**

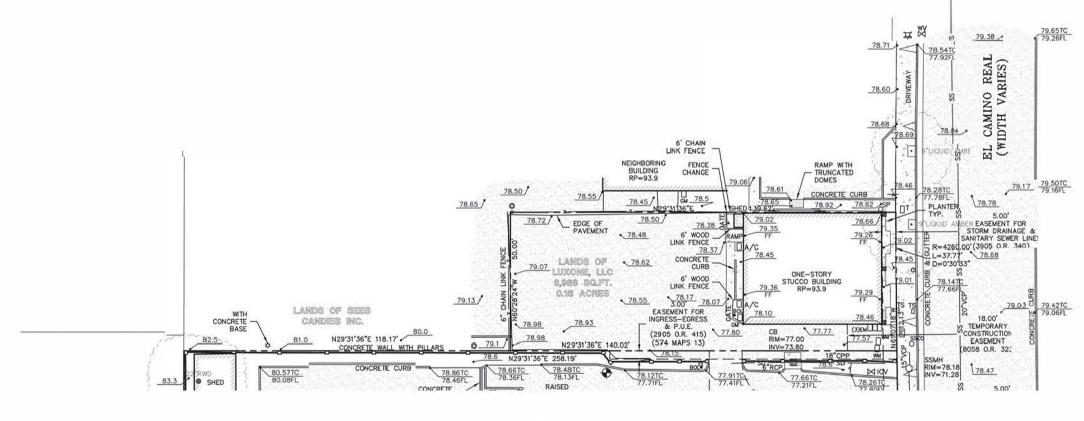
EASEMENTS SHOWN ARE PER TITLE REPORT PREPARED BY FIRST AMERICAN TITLE COMPANY, ORDER NO. 4316-5820193, DATED JANUARY 18. 2018 AND EASEMENT DOCUMENT NO. 23893177. NOTE: EASEMENT DOCUMENT

(K331 O.R. 1473)
ADJUSTS THE EASEMENT SHOWN ON PARCEL MAP (574 MAPS 13) AND DESCRIBED IN DOCUMENT (K157 O.R. 1249)

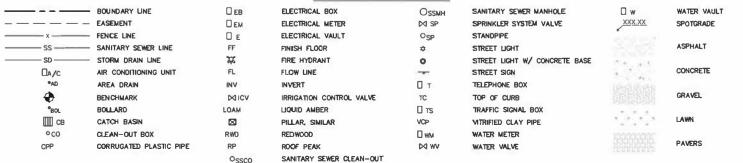
SSMH RIM=78.62 INV=61.72

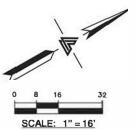
## **BENCHMARK**

CITY OF MOUNTAIN VIEW BENCHMARK IV-25
BRONZE DISK STAMPED "IV-25" SET IN TOP OF
CURB AT THE NORTH END OF THE NORTHWEST
RETURN OF SHOWERS DR & EL CAMINO REAL
ELEVATION = 76.789' (NAVD 88 DATUM)



## LEGEND AND NOTES





ENGINEERING, I BRAZE

LEA &

REAL

9

48

EL CAMINO LOS ALTOS CALIFORNIA 4

FOPOGRAPHIC STIDVEV

NEW TR 05-08-1 REVISIONS JOB NO: 2160409 5-16-16 DATE: 1" = 16" SCALE: FIELD BY: EH DRAWN BY: DB

