

**COUNTY OF SAN MATEO
PLANNING AND BUILDING DEPARTMENT**

DATE: February 10, 2016

TO: Planning Commission

FROM: Planning Staff

SUBJECT: EXECUTIVE SUMMARY: Consideration of a Resource Management District Permit, Grading Permit, Architectural Review Exemption, and certification of a Mitigated Negative Declaration, pursuant to the California Environmental Quality Act, to construct a new single-family residence, associated structures, and 3,381 cubic yards of grading. The project is located at 13040 Skyline Boulevard in the unincorporated North Skyline area of San Mateo County.

County File Number: PLN 2015-00236 (Parlette/Stern)

PROPOSAL

The applicant proposes to demolish an existing single-family residence and construct a new 3,568 sq. ft., two-story, single-family residence with an attached 743 sq. ft. garage; septic system and leach field; underground 1,000 gallon propane tank; on-site guest parking area; fire truck turnout; retaining walls ranging from 4 - 8 feet in height; and two outdoor patio areas. Grading includes 1,870 cubic yards of excavation and 1,511 cubic yards of fill (total earthwork is 3,381 cubic yards) for construction of an outdoor patio area, driveway, fire truck turnaround, and building footprint. The existing 10,000 gallon water tank and the existing domestic well will remain on-site and will be utilized by the new residence. Eight trees within the building footprint are proposed for removal (ranging from 14" dbh - 38" dbh and consisting of oaks, one cypress, one fruit tree and three hazelnut trees). The subject property is located within the Skyline Boulevard State Scenic Corridor. However, the project will not be visible from the scenic corridor thus qualifying for an Architectural Review Exemption.

RECOMMENDATION

That the Planning Commission certify the Initial Study and Mitigated Negative Declaration, and approve the Resource Management Permit and Grading Permit, County File Number PLN 2015-00236, by making the required findings and adopting the conditions of approval as listed in Attachment A.

SUMMARY

The proposed project involves the construction of a single-family residence with associated site improvements. The project includes 3,381 cubic yards of earthwork for construction of the residence and emergency access to the site. While the subject parcel is within the Skyline Boulevard State Scenic Corridor, the project will not be visible from the scenic corridor due to dense vegetation on the project site and downward sloping topography.

The project is consistent with the environmental quality criteria, site design criteria, utilities, water resources, cultural resources, hazards to public safety, and primary scenic resources areas criteria of the Resource Management District zoning standards. The project proposes colors that blend with the natural environment and will be stepped down from Skyline Boulevard. The project is also compliant with the County's Grading Ordinance, as conditioned, and will not have significant adverse environmental impacts.

The Initial Study and Mitigated Negative Declaration identified mitigation measures to reduce any potential impacts to less than significant levels; these measures are included as conditions of approval.

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COUNTY OF SAN MATEO
PLANNING AND BUILDING DEPARTMENT

DATE: February 10, 2016

TO: Planning Commission

FROM: Planning Staff

SUBJECT: Consideration of a Resource Management District Permit, pursuant to Section 6310 of the County Zoning Regulations, Grading Permit, pursuant to Section 8600 of the Grading Ordinance, Architectural Review Exemption, pursuant to the Streets and Highways Code, and certification of a Mitigated Negative Declaration, pursuant to the California Environmental Quality Act, to construct a new single-family residence, associated structures, and 3,381 cubic yards of grading. The project is located at 13040 Skyline Boulevard in the unincorporated North Skyline area of San Mateo County.

County File Number: PLN 2015-00236 (Parlette/Stern)

PROPOSAL

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RECOMMENDATION

That the Planning Commission certify the Initial Study and Mitigated Negative Declaration, and approve the Resource Management Permit and Grading Permit, County File Number PLN 2015-00236, by making the required findings and adopting the conditions of approval as listed in Attachment A.

BACKGROUND

Report Prepared By: Olivia Boo, Project Planner, Telephone 650/363-1818

Applicant: Chris Parlette

Owner: Henry Stern Family, LLP

Location: 13040 Skyline Boulevard, unincorporated North Skyline

APN: 067-230-030

Size: 2.50 Acre Parcel (108,902 sq. ft.)

Existing Zoning: RM (Resource Management) District

General Plan Designation: Open Space Rural

Parcel Legality: The subject parcel is developed with a legal 1,500 sq. ft. single-family residence. Since the residence was constructed with permits, the permit establishes parcel legality.

Existing Land Use: The subject parcel is developed with a legal 1,500 sq. ft. single-family residence.

Water Supply: A private individual on-site well services the property. There is no domestic water service available in this area.

Sewage Disposal: A private individual on-site septic system and leach field service the property. The installation of a new on-site septic system (to replace the existing septic system and leach field) is proposed as part of this project. The County's Environmental Health Division has reviewed the plans, and issued preliminarily and provided conditional approval.

Flood Zone: The project site is located in Flood Zone X as defined by FEMA (Community Panel Number 06081C0280E, dated October 16, 2012), which is an area with minimal potential for flooding.

Environmental Evaluation: An Initial Study and Mitigated Negative Declaration were prepared for this project and circulated from December 30, 2015 to January 19, 2015. As of the publication of this report, no comments were received.

Setting: The parcel is currently developed with a 1,500 sq. ft. residence, driveway, domestic well, septic system/leach field, and water tank. The surrounding area consists largely of parcels that are undeveloped open space (Purisima Creek Redwoods Open Space Preserve) and low density residential development. The development that is

present in the area consists of sparse low-density residential development. The parcel and vicinity is heavily forested and gradually slopes down from Skyline Boulevard.

DISCUSSION

A. KEY ISSUES

1. Conformity with the General Plan

Staff has reviewed the project for conformity with all applicable General Plan Policies. The policies applicable to this project include the following:

Policy 1.24 (*Protect Vegetative, Water, Fish and Wildlife Resources*) calls for the regulation of development to minimize significant adverse impacts and to encourage enhancement of vegetative, water, fish and wildlife resources. The subject parcel is located in a heavily wooded area on Skyline Boulevard. The project proposes to remove eight trees which consist of three oaks, one cypress, one fruit tree, and three hazelnut trees. All of the trees are within the construction footprint. No additional trees or vegetation beyond that necessary to construct the residence and associated structures are proposed.

A review of the County's Geographic Information System (GIS) California Natural Diversity Database identified Kings Mountain manzanita (*Arctostaphylos regismontana*) to have the potential to exist in the area. The California Native Plant Society lists the plant as rare, threatened, or endangered in California. As a result, a site survey was completed by Biotic Resources Group on December 4, 2015. The biologist report confirms that no Kings Mountain manzanita was found on the subject property. The biologist report found that the proposed tree removal for the residential development may impact nesting birds if nesting birds are present at the time of tree removal or limbing. The report recommends that all vegetation removal occur between August 1 and March 1 to avoid impacts to protected birds during the nesting season, if present. If work is proposed during this time frame, the applicant shall hire a qualified biologist to conduct a preconstruction nesting bird survey and identify a buffer zone around any present nests. No work shall be conducted until the biologist confirms that all young have fledged the nest, if present. The biologist's recommendation is included as Condition No. 5 in Attachment A.

Policy 2.17 (*Minimize Soil Erosion and Sedimentation*) calls for the regulation of development to minimize soil erosion and sedimentation. The project proposes 1,870 cubic yards of fill and 1,511 cubic yards of cut for the residence and driveway construction. The project involves improvements to the two existing driveways (one driveway for the proposed new residence and one for the emergency vehicle access), in order to meet the

requirements set by the County Fire Authority regarding emergency access and the Department of Public Works for driveway standards. For the residence, the house will be recessed into the hill giving the appearance of a single-story residence from Skyline Boulevard, though the residence will not be visible from the roadway. The proposed development will be located on the front half of the parcel and site preparation for these improvements will result in 3,381 cubic yards of cut and fill. The rear half of the parcel will remain undisturbed. The Mitigated Negative Declaration includes mitigation measures requiring the implementation of soil and erosion control measures during project construction, as well as post-construction measures to ensure that the disturbed areas are secured and revegetated. These measures have also been included as conditions of approval in Attachment A of this report. Should the applicant pursue a building permit between October 1 and April 30, during the wet season moratorium, a winter grading request is required to be submitted for review and subject to discretionary approval by the Community Development Director. As conditioned, the project will minimize potential soil erosion during construction activities.

Policy 4.22 (*Scenic Corridors*) calls for the protection and enhancement of the visual quality of scenic corridors by managing the location and appearance of structural development. The subject property is located within the Skyline Boulevard State Scenic Corridor. The property is buffered from public viewpoints from the roadway by existing heavy mature vegetation and site topography. The front half of the property has a 30% downward slope from Skyline Boulevard. The residence will recess into existing topography giving the home a relatively low profile. The proposed residence, designed to be built into the topography, has the appearance of a single-story residence. The residence will utilize colors and materials that blend with the natural environment. Given that the parcel slopes downward from Skyline Boulevard, and the natural visual buffer of the existing vegetation, the proposed development will not be visible from Skyline Boulevard. The proposed tree removal will not affect the existing vegetation screening as seen from the Skyline Scenic Corridor.

Policies 4.25 and 4.26 (*Location of Structures and Earthwork Operations*) call for the regulation of the location of development to minimize the impacts of noise, light, glare and odors on adjacent properties and roads. These policies also call for the proposed development to conform to the natural vegetation, landforms, and topography of the existing site while keeping grading or earth-moving operations to a minimum. As discussed, the proposed driveway modifications and single-family residence are clustered on the front half of the parcel and in the area of the existing residence. While the grading quantities are substantial, given the size of the parcel, the rear half of the parcel remains undisturbed.

2. Conformance with the Zoning Regulations

a. Resource Management District Regulations

As a legal parcel, the property is allocated one density credit which is required for one single-family residence (Section 6317 *Maximum Density of Development*). Single-family residences are allowed in the RM District subject to RM permit approval. As shown in the table below, the proposed structures complies with the development standards of the RM District (Section 6319A Maximum Height of Structures) and Section 6319B Minimum Yards) which regulate the height of structures and the required setbacks.

	A	B
	Resource Management Development Standards	Proposed
Minimum Lot Size	NA	2.5 acres (existing)
Minimum Front Setback	50 feet ¹	50 feet
Minimum Side Setback	20 feet	36 feet (right) 36 feet (left)
Minimum Rear Setback	20 feet	>72 feet
Maximum Building Height	36 feet	19 feet
1. The County's <i>Standards for Architectural and Site Control Within the Skyline Scenic Corridor</i> identify a minimum building setback of 100 feet from Skyline. Where the building site is in a subdivided area prior to the adoption of Skyline Boulevard in 1963, a 50-foot setback is required.		

b. Resource Management (RM) District Development Review Criteria

Pursuant to Section 6313 and Section 6324 of the Zoning Regulations, all development proposed for parcels with an RM zoning designation are further subject to the Development Review Criteria found in Chapter 20A.2 of the Zoning Regulations. Compliance with the applicable criteria is discussed below:

(1) Environmental Quality Criteria

The proposed project adheres to the standards set by this section, as it is designed and located to reduce impacts to the environment. The proposed structure, driveways, propane tank, retaining walls, and septic system/leach field are to be clustered at the front half of the parcel on the site. The project is also in compliance with these criteria, as the proposed residential use does not introduce significant amounts of air pollution, noxious odors, pesticides, or other chemicals.

(2) Site Design Criteria

This section addresses site design criteria as well as primary scenic resource area goals. The project is compliant with these criteria, as the proposed development has been located, sited, and designed so that it fits the existing environment and clusters site disturbance. The proposed structure is designed to be subordinate to the surrounding forest canopy and will utilize natural earth-tone colors, which blend with the surrounding natural vegetation. While the project site is located within the Skyline Boulevard State Scenic Corridor, as designed and located, the residence, due to distance, topography, existing trees, and vegetation, will not be visible from the scenic corridor.

(3) Utilities

With regard to the provision of utilities, the proposed project has been reviewed by the County's Environmental Health Division. This review determined that the proposed redesigned septic system complies with the Environmental Health Division preliminary requirements in order for the project to move forward.

(4) Water Resources Criteria

The project, as designed, involves a significant amount of cut and fill in order to complete the project improvements, and to prepare the site for the proposed structures. These measures were reviewed by the Department of Public Works and received conditional approval. Further, the project will be required to utilize best management practices for grading activities.

(5) Cultural Resources Criteria

These criteria require the preservation of archaeological and/or paleontological resources. The project is not expected to cause an adverse impact to any potential cultural resources; however, standard conditions of approval are recommended since the location of the new residence will extend beyond the existing house footprint, thereby disturbing new undeveloped areas. Due to earthwork associated with the project construction, the project may have the potential to impact any unknown cultural resources. These measures are included in the Mitigated Negative Declaration and in the conditions of approval as detailed in Attachment A.

(6) Hazards to Public Safety

The project site is not located within the Alquist-Priolo Fault Zone. The Association of Bay Area Governments Earthquake Liquefaction and Shaking Map indicates that the parcel is in a Very Strong area. The San Mateo County Hazard Map notes the site is located less than 2 miles from the San Andreas Fault and would be expected to experience significant shaking during a seismic event. The Geotechnical Investigation conducted by Romig Engineers, Inc. concluded that the site is suitable for construction of the proposed residence and has outlined recommendations for construction details (e.g., pier and grade beam foundation, fill material, etc.) during the building permit stage. Based on the report, the Geotechnical Section has given preliminary approval of the project. Construction is required to meet building code seismic criteria. These requirements have been included as conditions of approval in Attachment A.

(7) Primary Scenic Resource Areas Criteria

The criteria of this section specifically apply to properties located within scenic corridors and other primary scenic resource areas. As mentioned previously, this parcel is located within the Skyline Boulevard State Scenic Corridor and therefore is subject to review under this section. The project was found to be compliant with these criteria, as the proposed structures will be screened from the scenic roadway. Further, the structures utilize earth-tone colors which help to blend the structures into the natural environment and minimize any visual impacts. Access to the site will be provided by an existing driveway which will be improved to meet County and State Fire access standards. The project will also minimize tree removal to those trees within the building footprint. The parking area and majority of the driveway will also be screened from Skyline Boulevard to protect the scenic corridor.

3. Conformity with the Grading Ordinance

The proposed grading activities for this project involve cut and fill activities in order to modify the existing driveway to provide compliant emergency access to the development on the parcel, to create the building pads for the proposed structure, and for the outdoor patios. The project includes 359 cubic yards of exported off-site disposal of soil.

Staff has reviewed the proposal against the required findings for the issuance of a grading permit and concluded that the project conforms to the

criteria for review contained in Section 8605 of the Grading Ordinance (i.e., standards for erosion and sediment controls and submittal of a geotechnical report). Given that the areas proposed for improvement are clustered amongst the existing development, the disturbed areas are focused and contained allowing the majority of the parcel to remain in its natural state. In order to approve this project, the Planning Commission must make the required findings contained in the grading regulations. Staff concludes that the findings can be made with a discussion of the findings provided below:

a. That the granting of the permit will not have a significant adverse effect on the environment.

The project has been conditioned to minimize potential significant adverse effects that may occur during earthwork operations by requiring the submittal of an erosion and sediment control plan (Condition No. 9), dust control plan (Condition No. 4), and adherence with the San Mateo Countywide Stormwater Pollution Prevention Program which requires Watershed Protection Maintenance Standards instruction to construction employees during the building permit stage. Further, no grading shall occur during the winter season (October 1 - April 30) unless approved by the Community Development Director (Condition No. 10).

b. That the project conforms to the criteria of the San Mateo County Grading Ordinance, including the standards referenced in Section 8605, and is consistent with the General Plan.

The project, as proposed, does conform to the criteria for review contained in the Grading Ordinance. As discussed in previous sections, the proposed grading and site impacts associated with this project are consistent with the County General Plan Policies regarding land use compatibility in rural lands and development standards to minimize land use conflicts with the natural environment. The project is also consistent with the intent of the Grading Ordinance, as the project avoids severe cuts or terracing of the site and, instead, utilizes a grading approach that will mimic the natural topography of the site. As proposed and conditioned, the project also includes revegetation and stabilization of the disturbed areas. In addition, the large majority of the parcel remains undisturbed, avoids any sensitive habitat, and would minimize potential impacts to open space resource lands as the development is clustered.

B. ARCHITECTURAL REVIEW EXEMPTION

Because the project is located within the Skyline Boulevard State Scenic Corridor, the project requires architectural review or architectural review exemption.

This project is found to be exempt from the Architectural Review requirement. A field inspection of this property found that the proposed project is located in an area that is screened by existing vegetation and topography and is not visible from Skyline Boulevard.

C. ENVIRONMENTAL REVIEW

An Initial Study and Mitigated Negative Declaration were prepared for this project and circulated from December 30, 2015 to January 19, 2016. No comments have been received to date.

D. REVIEWING AGENCIES

Building Inspection Section
Department of Public Works
Environmental Health Division
Geotechnical Section
Cal-Fire

ATTACHMENTS

- A. Recommended Findings and Conditions of Approval
- B. Vicinity Map
- C. Project Plans
- D. Tree Removal Plan
- E. Biotic Resources Group Biologist Report
- F. Geotechnical Investigation Report, Romig Engineers, Inc., November 2014
- G. Initial Study and Mitigated Negative Declaration

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County of San Mateo
Planning and Building Department

RECOMMENDED FINDINGS AND CONDITIONS OF APPROVAL

Permit or Project File Number: PLN 2015-000236 Hearing Date: February 10, 2016

Prepared By: Olivia Boo
Project Planner

For Adoption By: Planning Commission

RECOMMENDED FINDINGS

Regarding the Mitigated Negative Declaration, Find:

1. That the Planning Commission does hereby find that this Mitigated Negative Declaration reflects the independent judgment of San Mateo County.
2. That the Mitigated Negative Declaration is complete, correct, and adequate and prepared in accordance with the California Environmental Quality Act (CEQA) and applicable State and County Guidelines.
3. That, on the basis of the Initial Study, comments received hereto, and testimony presented and considered at the public hearing, there is no substantial evidence that the project will have a significant effect on the environment.
4. That the mitigation measures in the Mitigated Negative Declaration and agreed to by the owner and placed as conditions on the project have been incorporated into the Mitigation Monitoring and Reporting Plan in conformance with the California Public Resources Code Section 21081.6.

Regarding the Resource Management District Permit, Find:

General Criteria

5. That the project conforms to the Development Review Criteria contained in Chapter 20A.2 of the San Mateo County Zoning Regulations. The project complies with Section 6324.1, respectively, to address the potential for environmental impacts and water resources, as the project will not introduce noxious odors, chemical agents, or long-term noise levels. The project also complies with Sections 6324.2 through 6325.1, which address site design criteria, utilities, cultural resources, hazards, and primary scenic resource areas, as the project is not located near any sensitive habitats or waterways and has been

conditioned (Nos. 6 - 8) to protect any cultural resources that may be encountered during construction activities. Further, the geotechnical investigation concluded that the site is suitable for the proposed development. The project, as designed and conditioned, preserves the majority of mature trees and dominant vegetation. While the project is located within the scenic corridor, its design, existing topography, and vegetation ensure that there is no impact from scenic public viewpoints.

Regarding the Grading Permit, Find:

6. That this project, as conditioned, will not have a significant adverse effect on the environment. The project has been reviewed by Planning staff, the Geotechnical Section, and the Department of Public Works, which found that the project can be completed without significant harm to the environment provided all conditions are met.
7. That this project, as conditioned, conforms to the criteria of the San Mateo County Grading Ordinance and is consistent with the General Plan. Planning staff, the Geotechnical Section, and the Department of Public Works have reviewed the project and have determined its conformance to the criteria of Chapter 8, Division VII, San Mateo County Ordinance Code, including the standards referenced in Section 8605 and the San Mateo County General Plan.

RECOMMENDED CONDITIONS OF APPROVAL

Current Planning Section

1. The approval applies only to the proposal as described in this report and materials submitted for review and approval by the Planning Commission on June 4, 2015. The Community Development Director may approve minor revisions or modifications to the project if they are found to be consistent with the intent of and in substantial conformance with this approval.
2. This permit shall be valid for two (2) years from the date of approval in which time a building permit shall be issued. Any extension of this permit shall require submittal of an application for permit extension and payment of applicable extension fees sixty (60) days prior to the expiration date.
3. The Department of Fish and Game has determined that this project is not exempt from Department of Fish and Game California Environmental Quality Act filing fees per Fish and Game Section 711.4. The applicant shall pay to the San Mateo County Recorder's Office an amount of \$2,260 .25 plus the applicable recording fee at the time of filing of the Notice of Determination by the County Planning and Building Department staff within ten (10) business days of the approval.

The following conditions are mitigation measures from the Negative Declaration:

4. **Mitigation Measure 1:** Prior to any grading activities, the following minimum dust control measures shall be implemented and maintained throughout the duration of the project:
 - a. Water all active construction and grading areas at least twice daily.
 - b. Cover all trucks hauling soil, sand, and other loose materials or require all trucks to maintain at least 2 feet of freeboard.
 - c. Apply water two times daily, or apply (non-toxic) soil stabilizers on all unpaved access roads, parking areas, and staging areas at the project site.
 - d. Enclose, cover, water twice daily or apply (non-toxic) soil binders to exposed stockpiles (dirt, sand, etc.).
5. **Mitigation Measure 2:** Vegetation removal shall be scheduled to occur between August 1 and March 1 of any given year, which is outside the bird nesting season. If this is not possible, the applicant shall hire a qualified biologist to conduct preconstruction nesting bird surveys no more than 2 weeks prior to vegetation disturbance or removal. If nesting birds are present and may be impacted by the vegetation removal, the biologist shall designate a buffer zone around the nest (e.g., 50 feet for passerines and 200 feet for raptors) where no vegetation removal will take place until the biologist has confirmed that all young have fledged the nest.
6. **Mitigation Measure 3:** If during the construction phase any archaeological or historical evidence is uncovered or encountered during construction, the project has been conditioned to halt all excavations of the site within 30 feet and to retain an historian/archaeologist to investigate the findings. In addition, the Current Planning Section shall be notified of such findings, and no additional work shall be done on-site, until the historian/archaeologist has recommended appropriate mitigation measures, and those measures have been approved by the Current Planning Section.
7. **Mitigation Measure 4:** If during any site activities associated with the project any paleontological resource is discovered, all work within 30 feet shall be halted long enough to call in a qualified paleontologist to assess the find and propose appropriate mitigation measures. In addition, the Current Planning Section shall be notified of such findings, and no additional work shall be done until the paleontologist has recommended appropriate measures, and those measures have been approved by the Current Planning Section and implemented.
8. **Mitigation Measure 5:** The property owner, applicant, and contractors must be prepared to carry out the requirements of California State Law with regard to the

discovery of human remains during construction, whether historic or prehistoric. In the event that any human remains are encountered during site disturbance, all ground-disturbing work shall cease immediately and the County coroner shall be notified immediately. If the coroner determines the remains to be Native American, the Native American Heritage Commission shall be contacted within 24 hours. A qualified archaeologist, in consultation with the Native American Heritage Commission, shall recommend subsequent measures for disposition of the remains.

9. **Mitigation Measure 6:** Prior to any land disturbance and throughout the grading operation, the approved erosion control plan, as prepared and signed by the engineer of record, shall be implemented. Prior to issuance of the grading permit “hard card,” the applicant shall submit revised erosion control plan sheets that include the following additional measures for review and approval:
 - a. Show the location(s) for storage of construction material, construction equipment, and parking of construction vehicles on the erosion control plan (Sheet C304), as described in Section III (Management Practices Employed to Minimize Contact of Construction Materials, Equipment, and Vehicles with Stormwater) of the Erosion Control Notes and Details plan sheet.
 - b. Provide a detail for the proposed silt fencing and protection for stockpiled materials (such as anchored down plastic sheeting in dry weather), as described in Section IV (Construction Material Loading, Unloading, and Access Areas) of the Erosion Control Notes and Details plan (sheet C305).
 - c. Show the location(s) of construction staging area(s) on the erosion control plan (Sheet C304), as described in Section IV (Construction Material Loading, Unloading, and Access Areas) of the Erosion Control Notes and Details plan sheet.
 - d. Note on the tree protection detail of the Erosion Control Notes and Details plan (Sheet C305) that tree protection shall consist of orange plastic fencing at the driplines where feasible.
 - e. Provide a detail for the proposed “Limit of Construction” barrier/fencing (such as orange plastic fencing, chain link fencing, or other barrier measure) on the Erosion Control Notes and Details plan (Sheet C305).
 - f. Show the location(s) of any office trailer(s), storage sheds, and/or other temporary installations on the erosion control plan (as applicable). As necessary, show how these temporary structures will be accessed and protection for any access routes.
10. **Mitigation Measure 7:** No grading shall be allowed during the winter season (October 1 - April 30) or during any rain event to avoid potential increased soil

erosion unless prior written request by the applicant is made to the Community Development Director and approval is granted by the Community Development Director. A grading permit “hard card” is required prior to the start of any land disturbance/grading operation. The applicant shall submit a letter to the Current Planning Section, at least two (2) weeks prior to the commencement of grading, stating the date when grading operation will begin, anticipated end date of grading operation, including dates of revegetation, and estimated date of establishment of newly planted vegetation.

11. **Mitigation Measure 8:** The property owner, or designee, shall adhere to the San Mateo Countywide Stormwater Pollution Prevention Program “General Construction and Site Supervision Guidelines,” including, but not limited to, the following:
 - a. Delineation with field markers of clearing limits, easements, setbacks, sensitive or critical areas, buffer zones, trees, and drainage courses within the vicinity of areas to be disturbed by construction and/or by grading.
 - b. Protection of adjacent properties and undisturbed areas from construction impacts using vegetative buffer strips, sediment barriers or filters, dikes, mulching, or other measures as appropriate.
 - c. Performing clearing and earthmoving activities only during dry weather.
 - d. Stabilization of all denuded areas and maintenance of erosion control measures continuously between October 1 and April 30.
 - e. Storage, handling, and disposal of construction materials and wastes properly, so as to prevent their contact with stormwater.
 - f. Control and prevention of the discharge of all potential pollutants, including pavement cutting wastes, paints, concrete, petroleum products, chemicals, wash water or sediments, and non-stormwater discharges to storm drains and watercourses.
 - g. Use of sediment controls or filtration to remove sediment when dewatering site, and obtain all necessary permits.
 - h. Avoiding cleaning, fueling, or maintaining vehicles on-site, except in a designated area where wash water is contained and treated.
 - i. Limiting and timing application of pesticides and fertilizers to prevent polluted runoff.
 - j. Limiting construction access routes and stabilization of designated access points.

- k. Avoiding tracking dirt or other materials off-site; cleaning off-site paved areas and sidewalks using dry sweeping methods.
 - l. Training and providing instruction to all employees and subcontractors regarding the Watershed Protection Maintenance Standards and construction Best Management Practices.
 - m. Additional Best Management Practices in addition to those shown on the plans may be required by the Building Inspector to maintain effective stormwater management during construction activities. Any water leaving the site shall be clear and running slowly at all times.
 - n. Failure to install or maintain these measures will result in stoppage of construction until the corrections have been made and fees paid for staff enforcement time.
12. **Mitigation Measure 9:** For final approval of the grading permit, the property owner, or designee, shall ensure performance of the following activities within thirty (30) days of grading completion at the project site:
- a. The project engineer shall submit written certification, that all grading has been completed in conformance with the approved plans, conditions of approval/mitigation measures, and the County Grading Regulations, to the Department of Public Works and the Planning and Building Department's Geotechnical Section.
 - b. The geotechnical consultant shall observe and approve all applicable work during construction, sign Section II of the Geotechnical Consultant Approval form, and submit the signed form to the Planning and Building Department's Geotechnical Section and the Current Planning Section.
13. **Mitigation Measure 10:** The applicant shall implement the following basic construction measures at all times:
- a. 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 Toxic Control Measure Title 13, Section 2485 of California Code of Regulations [CCR]). Clear signage shall be provided for construction workers at all access points.
 - b. All construction equipment shall be maintained and properly tuned in accordance with the manufacturer's specifications. All equipment shall be checked by a certified visible emissions evaluator.
 - c. Post a publicly visible sign with the telephone number and person to contact at the lead agency regarding dust complaints. This person, or his/her

designee, 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.

The applicant shall submit an on-site drainage plan, as prepared by a civil engineer, showing all permanent, post-construction stormwater controls and drainage mechanisms at the time of each respectively submitted project application. The required drainage plan shall show, in all respective cases, the mechanisms necessary to contain all water runoff generated by on-site impervious surfaces, and to reduce the amount of off-site runoff through the use of on-site percolation facilities. The drainage plan shall also include facilities to minimize the amount of pollutants in stormwater runoff through on-site retention and filtering facilities.

The on-site drainage plan shall be submitted to the Current Planning Section for review and approval by the Community Development Director prior to the issuance of building permits. The plan shall be included as part of the project's final building permit application and construction plans. The County Building Inspection Section shall ensure that the approved plan is implemented prior to the project's final building and/or grading inspection approval.

14. The proposed project qualifies as a stormwater regulated site and will require monthly erosion and sediment control inspections during the rainy season, as required by the Regional Water Quality Control Board, and weekly construction inspections during the rainy season for sites within the ASBS Watershed, as required by the Special Protections.
15. As the project involves over one acre of land disturbance, the property owner shall file a Notice of Intent (NOI) with the State Water Resources Board to obtain coverage under the State General Construction Activity NPDES Permit. A copy of the project's NOI, WDID Number, and Stormwater Pollution Prevention Plan (SWPPP) shall be submitted to the Current Planning Section and the Building Inspection Section, prior to the issuance of the grading permit "hard card."
16. No grading activities shall commence until the property owner has been issued a grading permit (issued as the "hard card" with all necessary information filled out and signatures obtained) by the Current Planning Section.
17. No grading shall be allowed during the winter season (October 1 to April 30) to avoid potential soil erosion. An applicant-completed and County-issued grading permit "hard card" is required prior to the start of any land disturbance/grading operations. Along with the "hard card" application, the applicant shall submit a letter to the Current Planning Section, at least two (2) weeks prior to commencement of grading, stating the date when grading operations will begin,

anticipated end date of grading operations, including dates of revegetation, and the estimated date of establishment of newly planted vegetation.

18. Prior to any land disturbance and throughout the grading operation, the property owner shall implement the erosion control plan, as prepared and signed by the engineer of record and approved by the decision maker. Revisions to the approved erosion control plan shall be prepared and signed by the engineer and submitted to the Community Development Director for review and approval.
19. Prior to issuance of the grading permit “hard card,” the property owner shall submit a schedule of all grading operations to the Current Planning Section, subject to review and approval by the Current Planning Section. The submitted schedule shall include a schedule for winterizing the site. If the schedule of grading operations calls for the grading to be completed in one grading season, then the winterizing plan shall be considered a contingent plan to be implemented if work falls behind schedule. All submitted schedules shall represent the work in detail and shall project the grading operations through to completion.
20. The property owner shall adhere to the San Mateo Countywide Stormwater Pollution Prevention Program “General Construction and Site Supervision Guidelines” including, but not limited to, the following:
 - a. Delineation with field markers of clearing limits, easements, setbacks, sensitive or critical areas, buffer zones, trees, and drainage courses within the vicinity of areas to be disturbed by construction and/or grading.
 - b. Protection of adjacent properties and undisturbed areas from construction impacts using vegetative buffer strips, sediment barriers or filters, dikes, mulching, or other measures as appropriate.
 - c. Performing clearing and earth-moving activities only during dry weather.
 - d. Stabilization of all denuded areas and maintenance of erosion control measures continuously between October 1 and April 30.
 - e. Storage, handling, and disposal of construction materials and wastes properly, so as to prevent their contact with stormwater.
 - f. Control and prevention of the discharge of all potential pollutants, including pavement cutting wastes, paints, concrete, petroleum products, chemicals, wash water or sediments, and non-stormwater discharges, to storm drains and watercourses.
 - g. Use of sediment controls or filtration to remove sediment when dewatering site, and obtain all necessary permits.

- h. Avoiding cleaning, fueling, or maintaining vehicles on-site, except in a designated area where wash water is contained and treated.
 - i. Limiting and timing application of pesticides and fertilizers to prevent polluted runoff.
 - j. Limiting construction access routes and stabilization of designated access points.
 - k. Avoiding tracking dirt or other materials off-site; cleaning off-site paved areas and sidewalks using dry sweeping methods.
 - l. Training and providing instruction to all employees and subcontractors regarding the Watershed Protection Maintenance Standards and construction Best Management Practices.
 - m. Additional Best Management Practices in addition to those shown on the plans may be required by the Building Inspector to maintain effective stormwater management during construction activities. Any water leaving the site shall be clear and running slowly at all times.
 - n. Failure to install or maintain these measures will result in stoppage of construction until the corrections have been made and fees paid for staff enforcement time.
21. It shall be the responsibility of the engineer of record to regularly inspect the erosion control measures for the duration of all grading remediation activities, especially after major storm events, and determine that they are functioning as designed and that proper maintenance is being performed. Deficiencies shall be immediately corrected, as determined by and implemented under the observation of the engineer of record.
22. For the final approval of the grading permit, the property owner shall ensure the performance of the following activities within thirty (30) days of the completion of grading at the project site:
- a. The engineer shall submit written certification, that all grading has been completed in conformance with the approved plans, conditions of approval/mitigation measures, and the Grading Regulations, to the Department of Public Works and the Planning and Building Department's Geotechnical Engineer.
 - b. The geotechnical consultant shall observe and approve all applicable work during construction and sign Section II of the Geotechnical Consultant Approval form, for submittal to the Planning and Building Department's Geotechnical Engineer and the Current Planning Section.

23. Only the trees identified in the approved plans are approved for removal as part of this permit approval. A separate permit shall be required for the removal of any additional trees. An application and processing, including applicable fees, shall be required prior to any additional tree removal.

Building Inspection Section

24. The applicant shall comply with all requirements of the Building Inspection Section at the building permit stage of the application.
25. The applicant shall show the propane tank installed per CPC and NFPA requirements.
26. Building permit plans shall include an alternative to wood burning fireplaces which are not allowed.
27. Building permit plans shall ensure a 30" width water closet space in the proposed 1/2 bath.

Environmental Health Division

28. At the building application stage, the applicant shall submit an application for a septic system along with three sets of septic design plans to the Environmental Health Division for approval.
29. At the building application stage, the applicant shall submit documentation verifying that the existing water source meets the quality and quantity standards of the Environmental Health Division.

Geotechnical Section

30. Prior to issuance of building permit issuance, Geotechnical consultant must respond to review sheet and review and approve the plans.

Department of Public Works

31. Prior to the issuance of the building permit or planning permit (for Provision C3 Regulated Projects), the applicant shall have prepared, by a registered civil engineer, a drainage analysis of the proposed project and submit it to the Department of Public Works for review and approval. The drainage analysis shall consist of a written narrative and a plan. The flow of the stormwater onto, over, and off of the property shall be detailed on the plan and shall include adjacent lands as appropriate to clearly depict the pattern of flow. The analysis shall detail the measures necessary to certify adequate drainage. Post-development flows and velocities shall not exceed those that existed in the pre-developed state. Recommended measures shall be designed and included in the improvement plans and submitted to the Department of Public Works for review and approval.

32. Prior to the issuance of the building permit, the applicant will be required to provide payment of "roadway mitigation fees" based on the square footage (assessable space) of the proposed building per Ordinance #3277.
33. Prior to the issuance of the building permit or planning permit (if applicable), the applicant shall submit a driveway "Plan and Profile," to the Department of Public Works, showing the driveway access to the parcel (garage slab) complying with County Standards for driveway slopes (not to exceed 20%) and to County Standards for driveways (at the property line) being the same elevation as the center of the access roadway. When appropriate, as determined by the Department of Public Works, this plan and profile shall be prepared from elevations and alignment shown on the roadway improvement plans. The driveway plan shall also include and show specific provisions and details for both the existing and the proposed drainage patterns and drainage facilities.

Cal-Fire

34. Fire Department access shall be within 150 feet of all exterior portions of the buildings or facility and all portions of the exterior walls of the first story of the buildings as measured by an approved access route around the exterior of the building or facility. Access shall be 20 feet wide, all weather capability, and able to support a fire apparatus weighing 75,000 lbs. Where a fire hydrant is located in the access, a minimum of 26 feet is required for a minimum of 20 feet on each side of the hydrant. This access shall be provided from a publicly maintained road to the property. Grades over 15% shall be paved and no grade shall be over 20%. When gravel roads are used, it shall be Class 2 base or equivalent compacted to 95%. Gravel road access shall be certified by an engineer as to the material thickness, compaction, all weather capability, and the weight it will support.
35. This project is located in a wildland urban interface area. Roofing, attic ventilation, exterior walls, windows, exterior doors, decking, floors, and underfloor protection shall meet CRC R327 or CBC Chapter 7A requirements. This condition is to be met at the building permit phase of the project.
36. All buildings that have a street address shall have the number of that address on the building, mailbox, or other type of sign at the driveway entrance in such a manner that the number is easily and clearly visible from either direction of travel from the street. New residential buildings shall have internally illuminated address numbers contrasting with the background so as to be seen from the public way fronting the building. Residential address numbers shall be at least 6 feet above the finished surface of the driveway. An address sign shall be placed at each break of the road where deemed applicable by the San Mateo County Fire Department. Numerals shall be contrasting in color to their background and shall be no less than 4 inches in height, and have a minimum 1/2-inch stroke. Remote signage shall be a 6-inch by 18-inch green reflective metal sign.

37. An Alternate Methods or Materials Request has been approved by the Fire Marshal for this project. All items on the approved request are to be met prior to Fire final inspection for the project.
38.
 - a. Any chimney or woodstove outlet shall have installed onto the opening thereof an approved (galvanized) spark arrester of a mesh with an opening no larger than 1/2 inch in size, or an approved spark arresting device.
 - b. Maintain around and adjacent to such buildings or structures a fuelbreak/firebreak made by removing and clearing away flammable vegetation for a distance of not less than 30 feet and up to 100 feet around the perimeter of all structures or to the property line, if the property line is less than 30 feet from any structure. This is neither a requirement nor an authorization for the removal of live trees. Remove that flammable portion of any tree which extends within 10 feet of the outlet of any chimney or stovepipe, or within 5 feet of any portion of any building or structures.
 - c. Remove that dead or dying portion of any tree which extends over the roofline of any structure.
39. Smoke alarms and carbon monoxide detectors are required to be installed in accordance with the California Building and Residential Codes. This includes the requirement for hardwired, interconnected detectors equipped with battery backup and placement in each sleeping room in addition to the corridors and on each level of the residence.
40. An approved automatic fire sprinkler system meeting the requirements of NFPA-13D is required to be installed in your project. Plans shall be submitted to the San Mateo County Building Inspection Section for review and approval by the San Mateo County Fire Department.
41. An interior and exterior audible alarm, activated by automatic fire sprinkler system water flow, shall be required to be installed in all residential systems. All hardware must be included on the submitted sprinkler plans.
42. A site plan showing all required components of the water system is required to be submitted with the building plans to the San Mateo County Building Inspection Section for review and approval by the San Mateo County Fire Department. Plans shall show the location, elevation and size of required water storage tanks, the associated piping layout from the tank(s) to the building/structures, the size of and type of pipe, the depth of cover for the pipe, technical data sheets for all pipes, joints, valves, valve indicators, thrust block calculations, joint restraint, the location of the standpipe/hydrant, and the location of any required pumps and their size and specifications.

43. Because of the fire flow and automatic sprinkler requirements for your project, an on-site water storage tank is required. Based upon building plans submitted to the San Mateo County Planning and Building Department, the San Mateo County Fire Department has determined that a minimum of 7,500 gallons of fire protection water will be required, in addition to the required domestic water storage. Plans showing the tank(s) type, size, location and elevation are to be submitted to the San Mateo County Fire Department for review and approval.
44. The water storage tank(s) shall be so located as to provide gravity flow to a standpipe/hydrant. Plans and specifications shall be submitted to the San Mateo County Building Inspection Section for review and approval by the San Mateo County Fire Department.
45. A Wet Draft Hydrant, with a 4 1/2" National Hose Thread outlet with a valve, shall be mounted 30 to 36 inches above ground level and within 5 feet of the main access road or driveway, and not less than 50 feet from any portion of any building, nor more than 150 feet from the main residence or building.
46. The standpipe/hydrant shall be capable of a minimum fire flow of 1,000 GPM.

California Department of Transportation

47. Work that encroaches onto the State right-of-way (ROW) requires an encroachment permit that is issued by CalTrans. To apply, a completed encroachment permit application, environmental documentation, and five (5) sets of plans clearly indicating the State ROW must be submitted to: Mr. David Salladay, Office of Permits, California Department of Transportation, District 4, P.O. Box 23660, Oakland, CA 94623-0660. Traffic-related mitigation measures should be incorporated into the construction plans during the encroachment permit process. See the website link for more information:
<http://www.dot.ca.gov/hq/traffops/developserv/permits/>.

OSB:jlh – OSBAA0002_WJU.DOCX

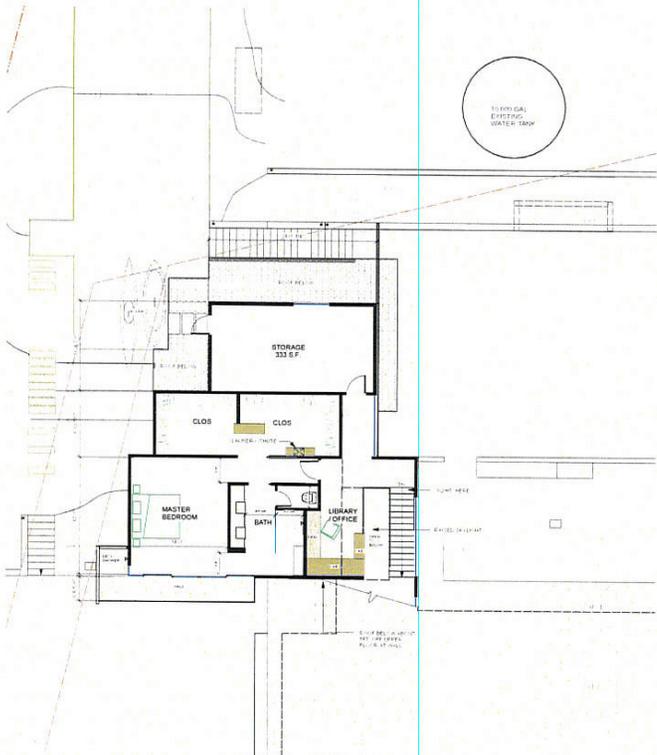


San Mateo County Planning Commission Meeting

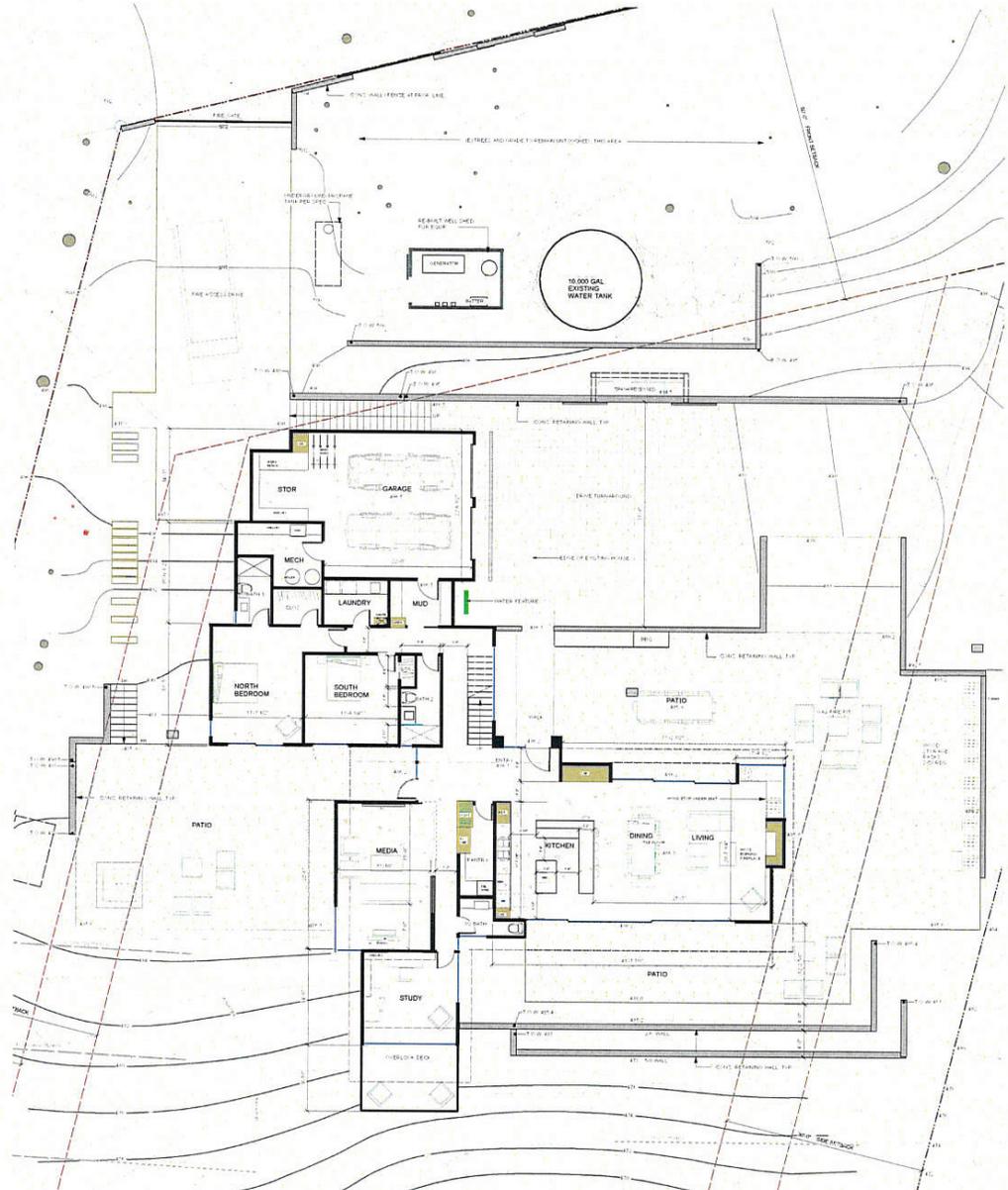
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Attachment: _____

File Numbers: _____



UPPER FLOOR PLAN
SCALE: 1/8" = 1'-0"



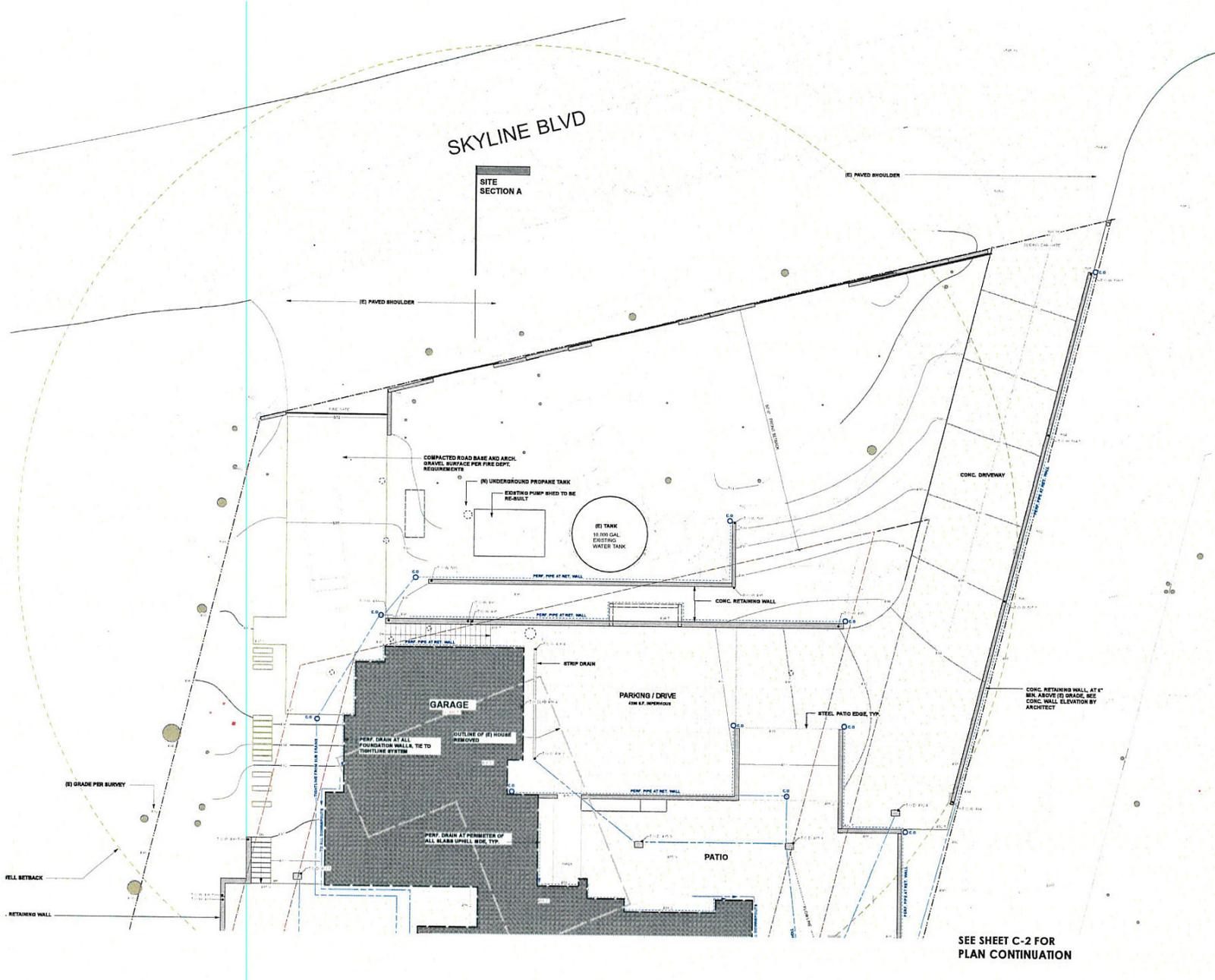
MAIN FLOOR PLAN
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San Mateo County Planning Commission Meeting

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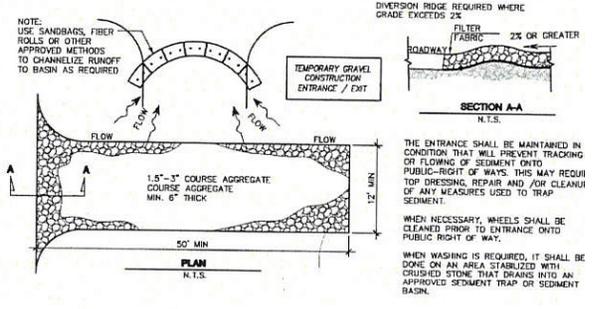
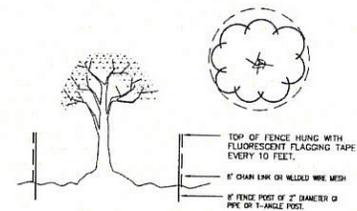
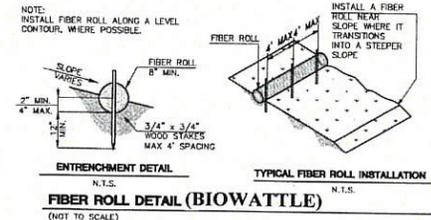
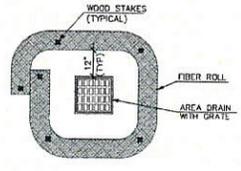
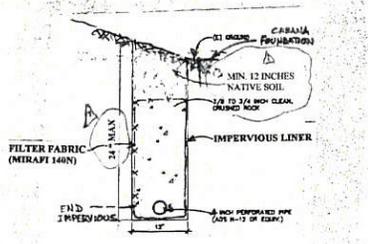
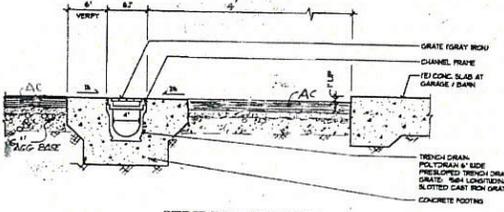
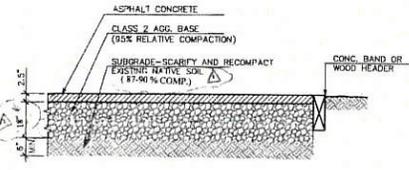
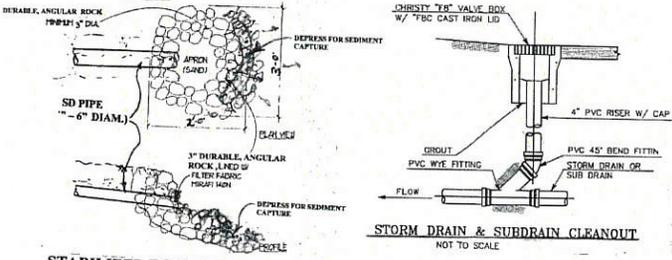
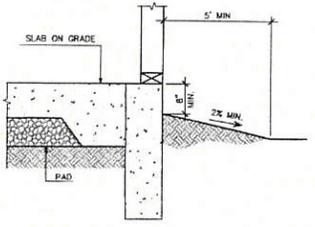
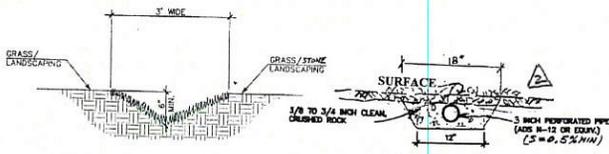
SEE SHEET C-2 FOR PLAN CONTINUATION

San Mateo County Planning Commission Meeting

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Attachment:

File Numbers:



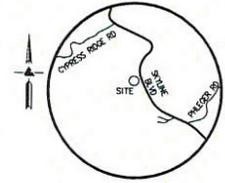
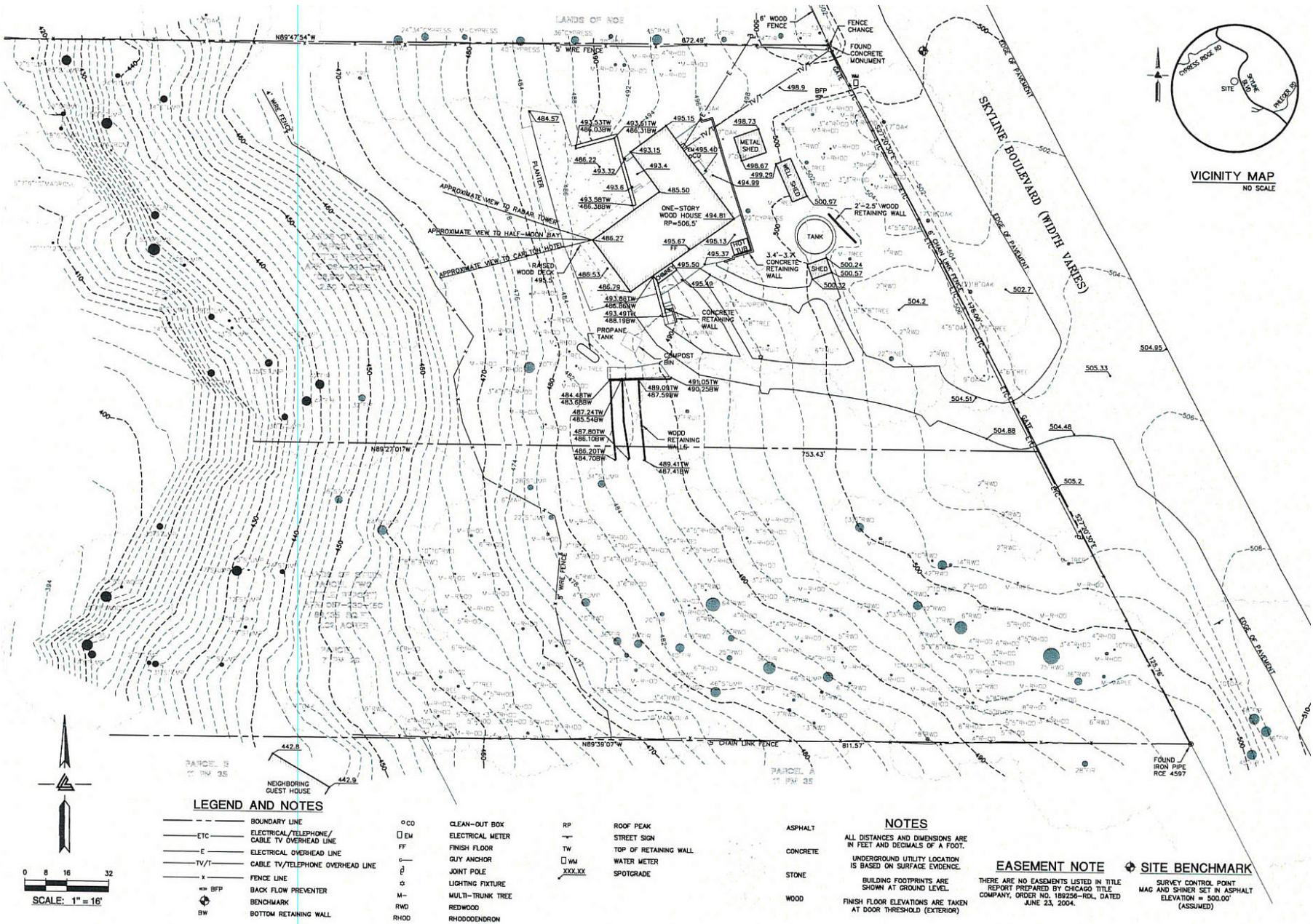
- DESIGN AND CONSTRUCTION SPECIFICATIONS FOR CONSTRUCTION ENTRANCE**
- JOHN C. BERRY
RCE 18720
EXP. 6-30-15
1. THE MATERIAL FOR CONSTRUCTION OF THE PAD SHALL BE 1-1/2 TO 3 INCH STONE.
 2. THE THICKNESS OF THE PAD SHALL NOT BE LESS THAN 8 INCHES.
 3. THE WIDTH OF THE PAD SHALL NOT BE LESS THAN THE FULL WIDTH OF ALL POINTS OF INGRESS AND EGRESS.
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San Mateo County Planning Commission Meeting

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File Numbers:



VICINITY MAP
NO SCALE

LEGEND AND NOTES

- BOUNDARY LINE
- ETC ELECTRICAL/TELEPHONE/CABLE TV OVERHEAD LINE
- E ELECTRICAL OVERHEAD LINE
- TV/T CABLE TV/TELEPHONE OVERHEAD LINE
- - - FENCE LINE
- - - BFP BACK FLOW PREVENTER
- ⊕ BENCHMARK
- ⊕ BW BOTTOM RETAINING WALL

- CO CLEAN-OUT BOX
- EM ELECTRICAL METER
- FF FINISH FLOOR
- ⊕ GUY ANCHOR
- ⊕ JOINT POLE
- ⊕ LIGHTING FIXTURE
- M- MULTI-TRUNK TREE
- RWD REDWOOD
- RHOD RHODODENDRON

- RP ROOF PEAK
- STREET SIGN
- TW TOP OF RETAINING WALL
- WM WATER METER
- XXX.XX SPOTGRADE

- ASPHALT
- CONCRETE
- STONE
- WOOD

NOTES

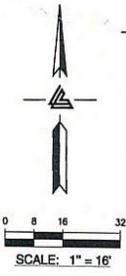
ALL DISTANCES AND DIMENSIONS ARE IN FEET AND DECIMALS OF A FOOT.
UNDERGROUND UTILITY LOCATION IS BASED ON SURFACE EVIDENCE.
BUILDING FOOTPRINTS ARE SHOWN AT GROUND LEVEL.
FINISH FLOOR ELEVATIONS ARE TAKEN AT DOOR THRESHOLD (EXTERIOR)

EASEMENT NOTE

THERE ARE NO EASEMENTS LISTED IN TITLE REPORT PREPARED BY CHICAGO TITLE COMPANY, ORDER NO. 189256-RDL, DATED JUNE 23, 2004.

SITE BENCHMARK

SURVEY CONTROL POINT
MAG AND SHINER SET IN ASPHALT
ELEVATION = 500.00'
(ASSUMED)

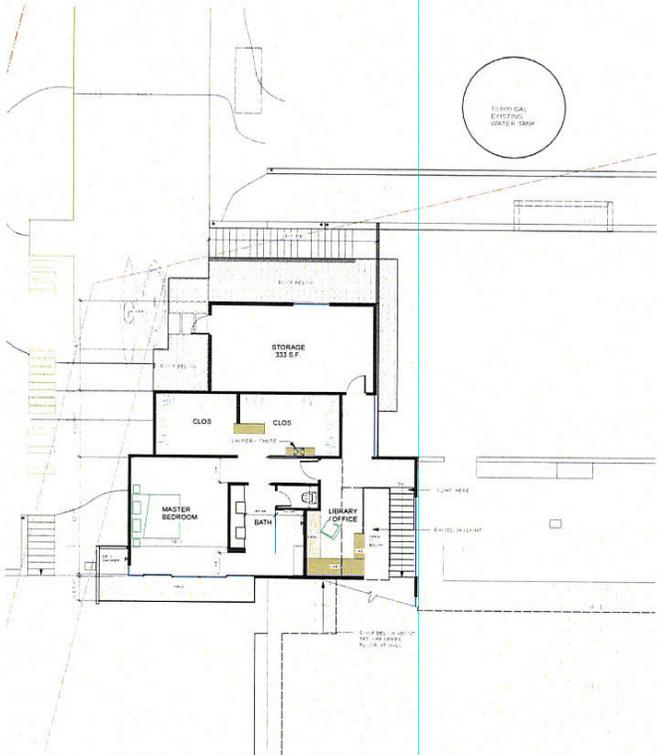


San Mateo County Planning Commission Meeting

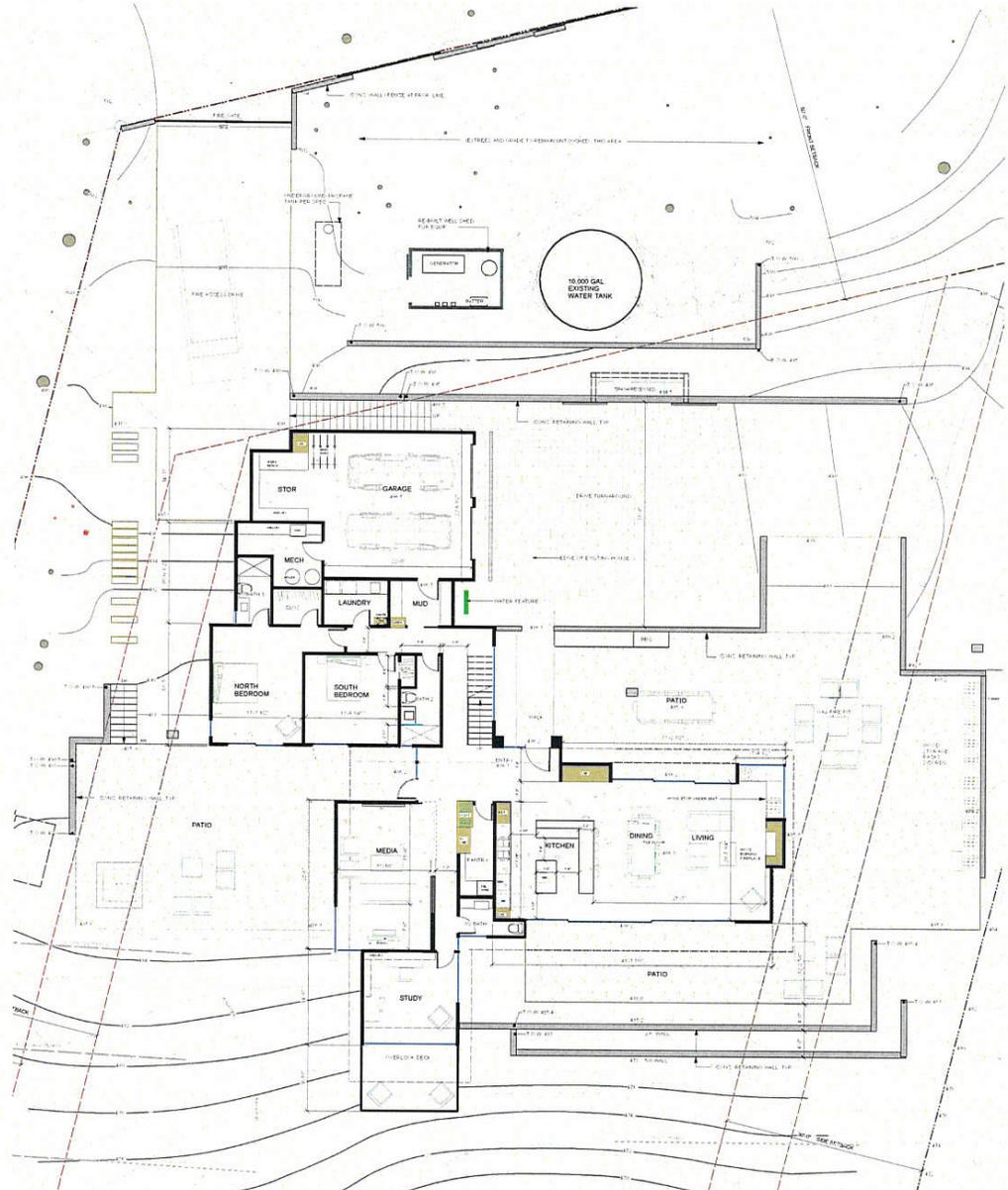
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UPPER FLOOR PLAN
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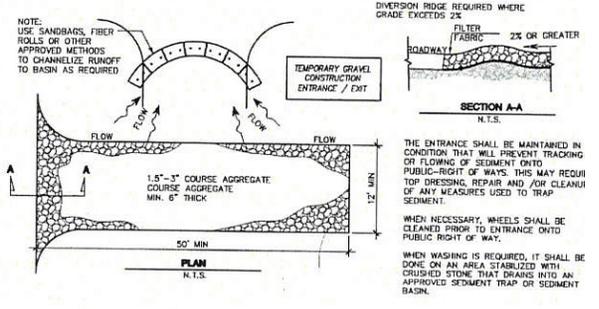
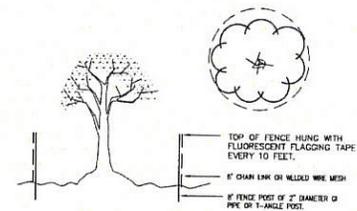
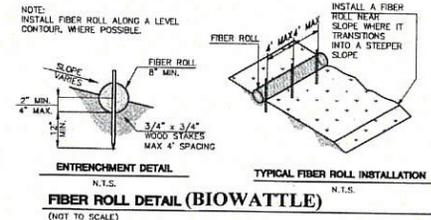
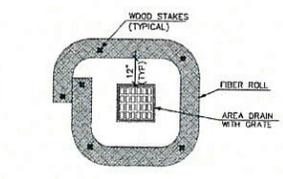
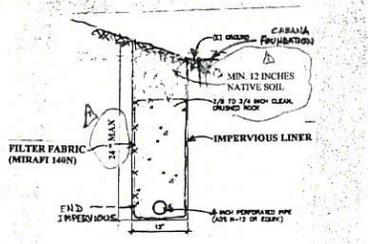
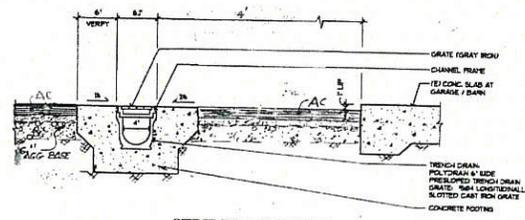
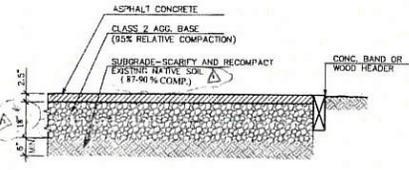
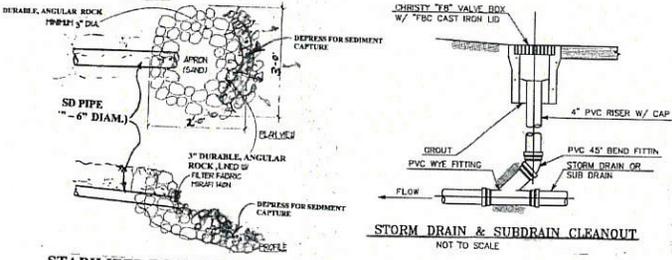
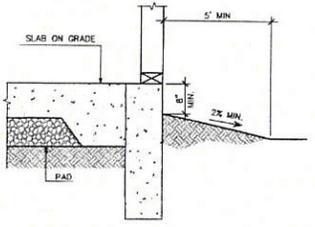
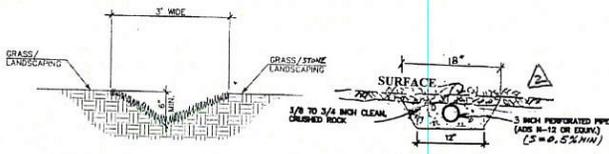
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San Mateo County Planning Commission Meeting

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RENDERINGS

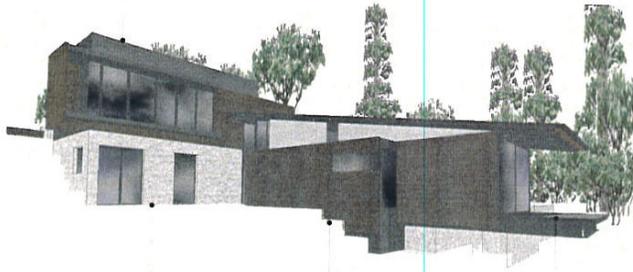


BOARD-FORM CONC. WALL SWINGING GATE PER FIRE DEPT. STANDARDS

LOOKING WEST TOWARDS FIRE ACCESS ENTRANCE

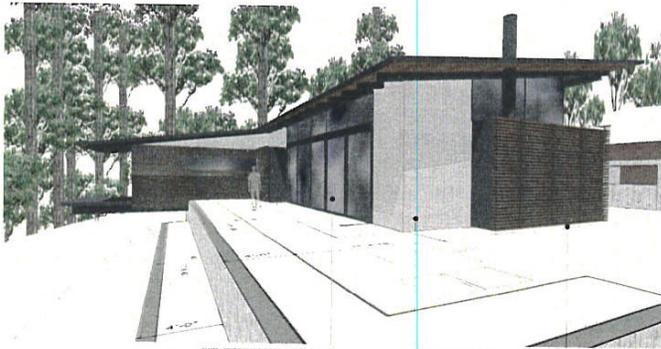
PHOTO E, EXISTING SITE CONDITIONS

CEMENT PANEL CLADDING



BOARD-FORM CONC. WALL COMPOSITE SCRIM MATERIAL PAINTED STEEL STRUCTURE AND METAL CABLE GUARDRAIL

NORTH / WEST VIEW OF RESIDENCE



SOUTH / WEST VIEW OF RESIDENCE

ALUM. WINDOW AND DOOR SYSTEM TYP. TEXTURED CONC. PANEL COMPOSITE SCRIM MATERIAL



ROLLING GATE AT DRIVEWAY ENTRANCE. WOOD COMPOSITE MATERIAL BOARD-FORM CONC. WALL COMPOSITE SCRIM MATERIAL AT FENCE - 6 FT WALL MAX. (E) TREES SHOWN

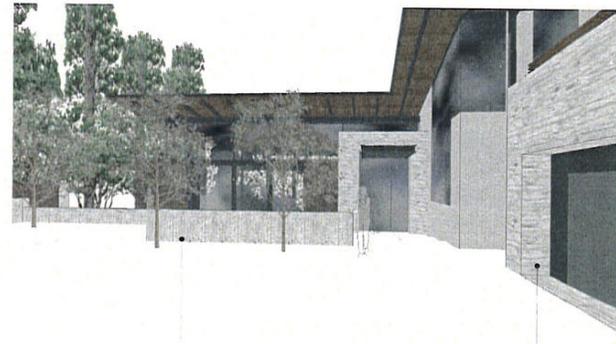
LOOKING WEST ACROSS SKYLINE BLVD. TO GATE AND FENCE

PHOTO C, EXISTING SITE CONDITIONS



ENTRY COURTYARD / PARKING AREA

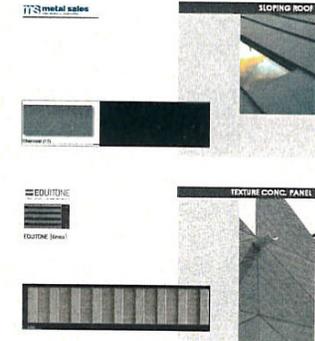
BOARD-FORM CONC. WALL TEXTURED CONC. PANEL



PARKING AREA AND ENTRANCE

BOARD-FORM CONC. WALL AT PARKING AREA BOARD-FORM CONC. WALL AT GARAGE AND ENTRY

MATERIALS AND COLORS



San Mateo County Planning Commission Meeting

Owner/Applicant:

File Numbers:

Attachment:



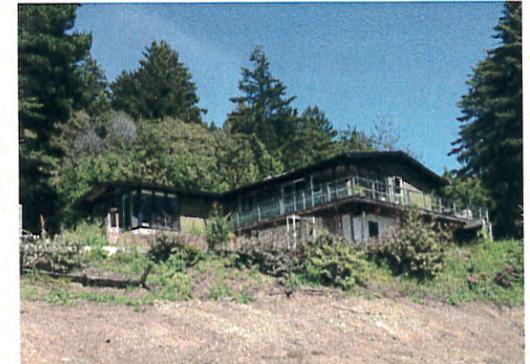
A VIEW DOWN EXISTING DRIVE TOWARDS THE NORTH / WEST. EXISTING HOUSE SOUTH SIDE



B EXISTING HOUSE EAST SIDE FACING SKYLINE BLVD. LOOKING WEST



C VIEW TO WEST TOWARDS PROPERTY ACROSS SKYLINE BLVD.



D VIEW TO SOUTH / EAST TOWARDS EXISTING HOUSE



E LOOKING WEST TO EXISTING HOUSE FROM SKYLINE BLVD. THIS IS PROPOSED FIRE ACCESS THRU EXISTING GATE AND DRIVE



F LOOKING EAST TO EXISTING WATER TANK AND EXISTING DRIVE TO THE SOUTH



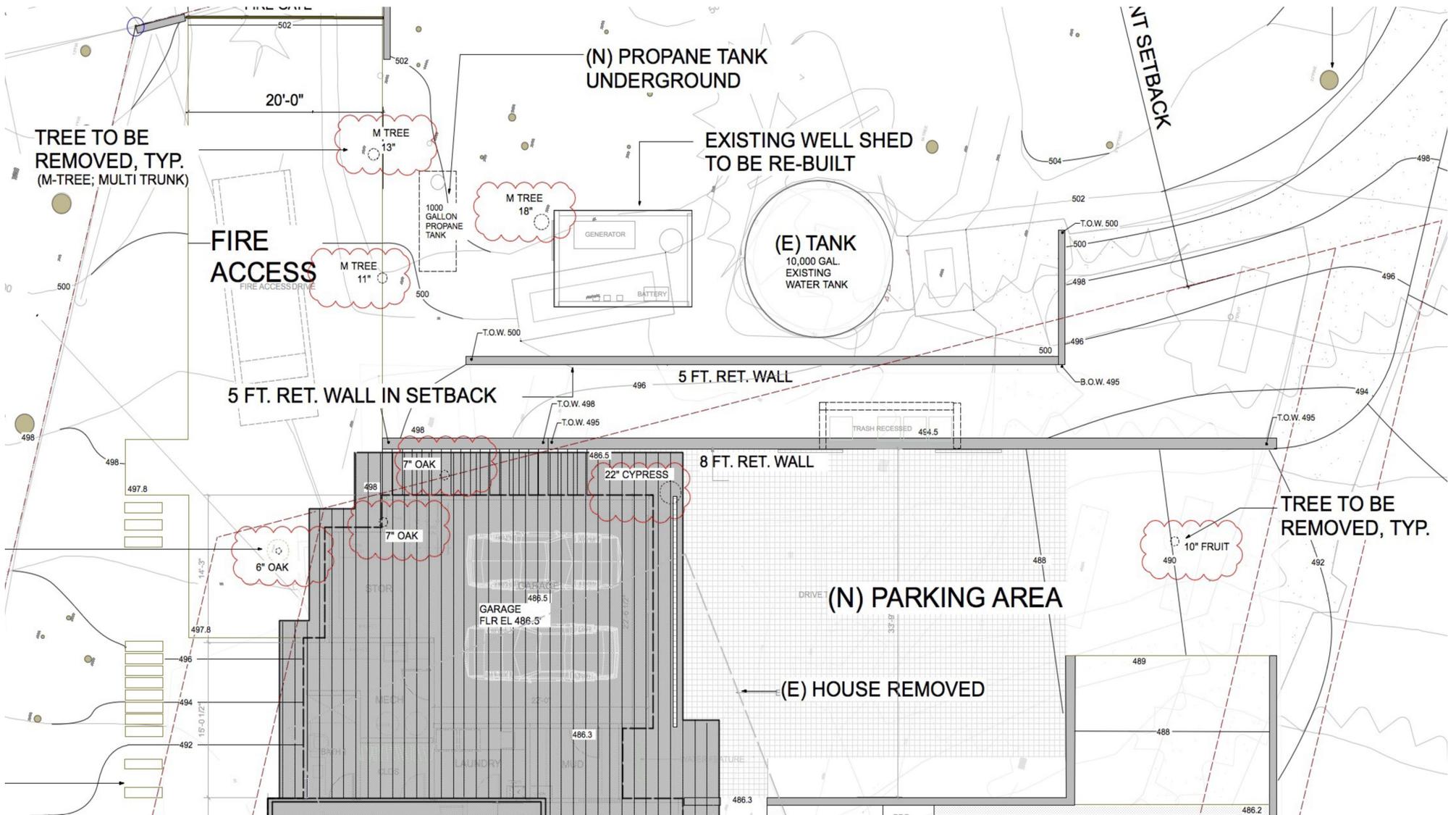
G EAST SIDE OF EXISTING HOUSE

San Mateo County Planning Commission Meeting

Owner/Applicant: _____

Attachment: _____

File Numbers: _____



San Mateo County Planning Commission Meeting

Owner/Applicant: _____

Attachment: _____

File Numbers: _____

13040 Skyline Boulevard
APN 067-230-030
San Mateo County, CA

Biological Report



Biotic Resources Group

Biotic Assessments ♦ Resource Management ♦ Permitting

Attachment E

Biotic Resources Group

Biotic Assessments ♦ Resource Management ♦ Permitting

13040 Skyline Boulevard
APN 067-230-030
San Mateo County, CA

Biological Report

Prepared for:

Hank and Marlene Stern

Prepared by:

Biotic Resources Group
Kathleen Lyons, Biologist

December 4, 2015

**13040 SKYLINE BOULEVARD
APN 067-230-030
SAN MATEO COUNTY, CA**

BIOLOGICAL REPORT

INTRODUCTION

The proposed residential development project site is located on Skyline Boulevard north of Harkins Road, in the Woodside area of central San Mateo County, California. The site is located west of Skyline Boulevard and is adjacent to other residentially-developed properties. The property encompasses approximately 2.5 acres (APN 067-230-030). The property's location is depicted on Figure 1.

Project Description

The landowner has proposed improvements to the property. The project includes demolition of the existing residence and supporting site features and new construction of the following: parking area, garage, patios, residence, septic tank and leach field, sloping soldier wall (southern property line), and a steel beam/soldier retaining wall (in central portion of property) (Berry & Associates, *Site Grading, Drainage and Utility Plan, dated 6/4/15*).

Biological Assessment

An assessment of the biotic resources on the property and a review of the proposed project area were conducted during a field visit in December 2015. The focus of the field assessment was to identify existing conditions and sensitive biotic resources on the property that may be affected by the proposed project.

Specific tasks conducted for this study include:

- Characterize the major plant communities on the property;
- Identify potential sensitive biotic resources, including plant and wildlife species of concern, within the project area;
- Evaluate the potential effects of the proposed project on sensitive biotic resources and recommend measures to avoid or reduce such impacts.

Intended Use of this Report

The findings presented in this biological report are intended for the sole use of Hank and Marlene Stern and San Mateo County in evaluating the proposed project for the subject parcel. The findings presented in this report are for information purposes only; they are not intended to represent the interpretation of any State, Federal or County laws or ordinances pertaining to permitting actions within sensitive habitat or endangered species. The interpretation of such laws and/or ordinances is the responsibility of the applicable governing body.

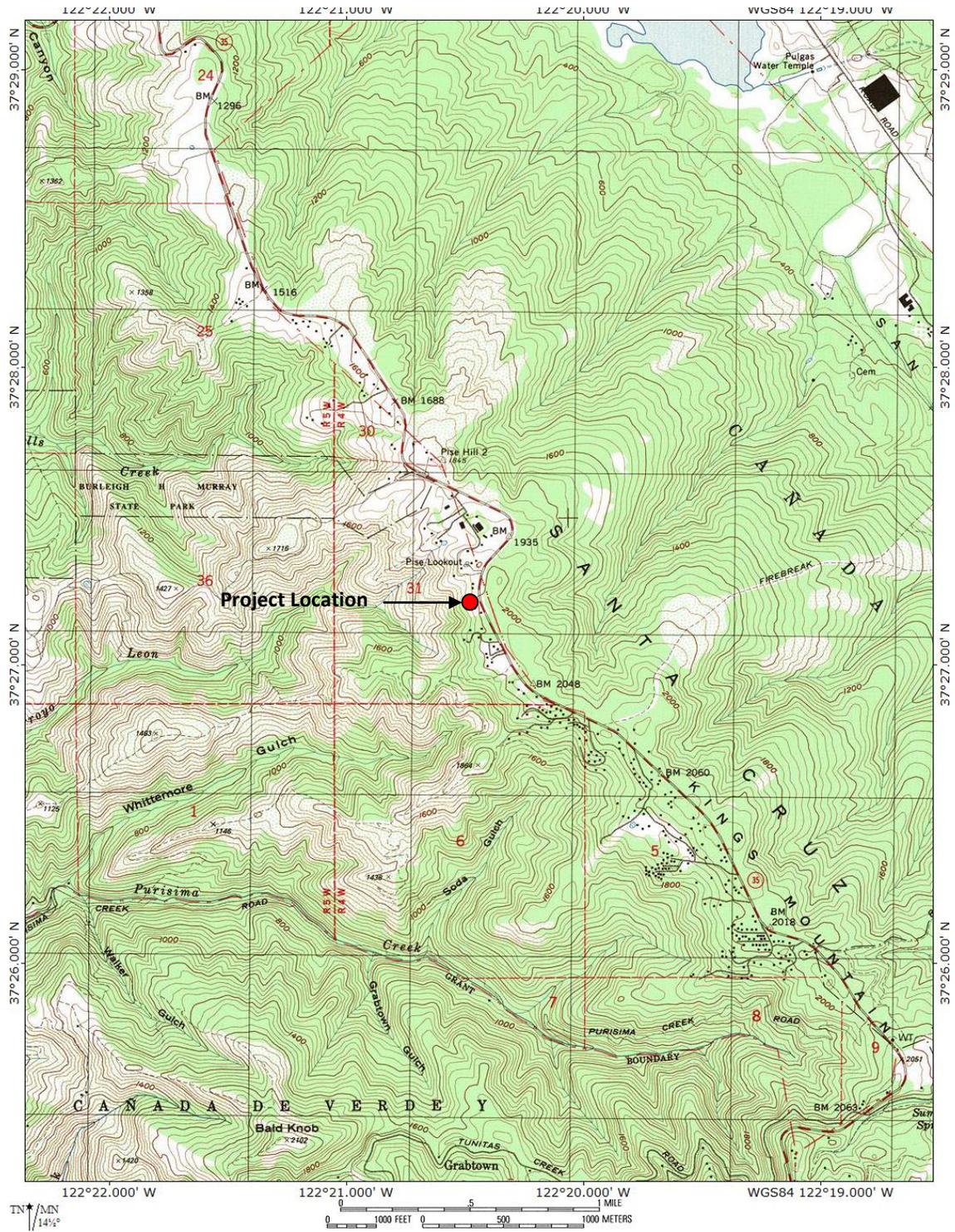


Figure 1. Location of Property (Woodside USGS Quadrangle)

EXISTING RESOURCES

METHODOLOGY

The biotic resources of the 2.5-acre property were assessed through a field visit in December 2015, review of aerial photos and review of pertinent literature for the project region. The proposed project site was walked by a biologist (Kathleen Lyons). During the field survey, the plant communities on the site were identified.

To assess the potential occurrence of special status biotic resources, two electronic databases were accessed to determine recorded occurrences of sensitive plant communities and sensitive species. Information was obtained from the California Native Plant Society's (CNPS) Electronic Inventory (2015) and California Department of Fish & Wildlife's (CDFW) Natural Diversity DataBase "RareFind 5" (CNDDDB) (CDFW, 2015) for the Woodside U.S.G.S. quadrangle and surrounding quadrangles.

Prior to conducting field surveys, a potential list of special status or sensitive species prepared, utilizing species recognized by CDFW, US Fish and Wildlife Service (USFWS), CNPS (List 1), and species identified by San Mateo County (e.g., Kings Mountain manzanita). Reconnaissance-level surveys were conducted in December 2015 to document the botanical and wildlife resources within the property; with the exception of perennial plant species, focused plant or animal surveys were not conducted. The *Jepson Manual* (Hickman, 2012) was the principal taxonomic references used for the botanical work.

This report summarizes the findings of the biotic assessment. The potential impacts of the proposed residential project on sensitive biological resources are discussed below. Measures to reduce significant impacts to a level of less-than-significant are recommended, as applicable.

BIOTIC RESOURCES

Three plant community types were observed on the property: mixed evergreen forest, successional scrub, and residential landscaping. The proposed residential development area occurs in each of these habitat types. The distribution of the plant communities within the property is depicted on Figure 2. Soil maps for the area indicate the region supports three soil types: Gazos fine sandy loam, moderately steep (GaD2), Gazos and Lobitos stoney loam, steep (GsE2), and Gazos and Lobitos stoney loam, very steep (GsF2). These soil types are derived from weathered sandstone; no serpentine-derived soils are mapped on the property or the immediate project region.

Mixed Evergreen Forest

This forest type grows along Skyline Boulevard and forms the northern, western, and southern boundaries of the property. The forest supports a mixture of trees and shrubs, including Douglas fir (*Pseudotsuga menziesii*), coast redwood (*Sequoia sempervirens*), tan oak (*Notholithocarpus densiflora*), madrone (*Arbutus menziesii*), hazel nut (*Corylus cornuta*), and salal (*Gaultheria shallon*). Planted trees and shrubs associated with previous uses on the site are also present, such as cypress (*Cupressus sp.*), rhododendron (*Rhododendron spp.*), dogwood (*Cornus sp.*), boxwood (*Buxus sp.*), and cotoneaster (*Cotoneaster sp.*). The sub shrub and herbaceous understory includes sword fern (*Polystichum munitum*), bracken fern (*Pteridium aquilinum*), and California blackberry (*Rubus ursinus*).

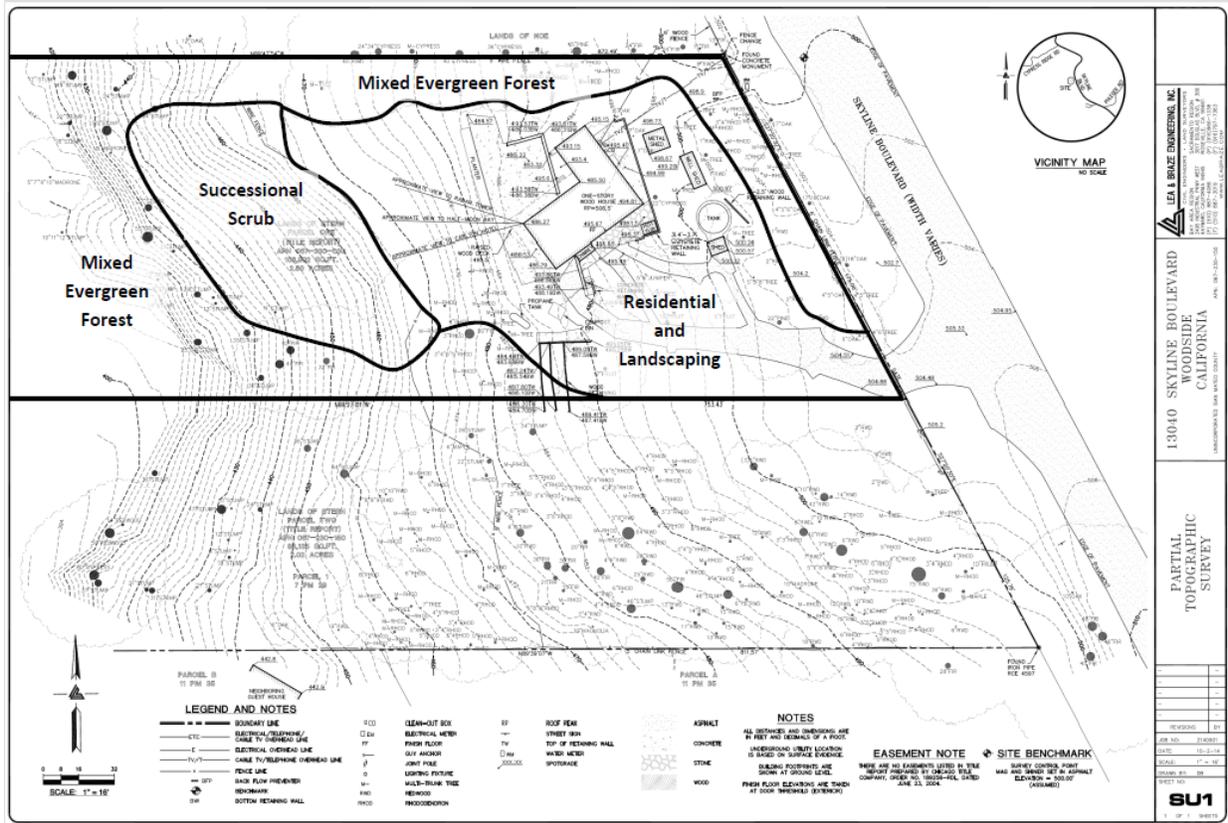


Figure 2. Distribution of Vegetation Types on Property

The wildlife value of the forest varies with the degree of canopy cover and the density and diversity of understory plants. Acorns from tan oaks provide an important food resource for many wildlife species, and natural cavities in trees provide nesting opportunities for some birds and mammals. The denser forested areas away from the residence may also provide escape cover during the day for species such as black-tailed deer (*Odocoileus hemionus*). Common wildlife species expected to occur in forest on the property include acorn woodpecker (*Melanerpes formicivorus*), western scrub-jay (*Aphelocoma californica*), chestnut-backed chickadee (*Poecile rufescens*), western gray squirrel (*Sciurus griseus*), and striped skunk (*Mephitis mephitis*). Figure 3 depicts the character of the mixed evergreen forest on the property.

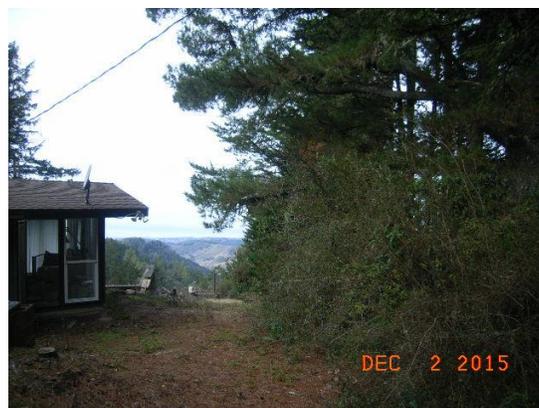


Figure 3. Character of mixed evergreen forest along northern edge of property

Successional Scrub

The slope below the existing residence supports successional scrub. The scrub transitions to mixed evergreen forest further down slope. The vegetation is comprised of dense shrubs, scattered trees and cut/re-growing cut tree stumps (i.e., tan oaks). If allowed to naturally recover the area would likely succeed to mixed evergreen forest. The vegetation is comprised of scattered trees of Douglas fir, madrone, tan oak, big leaf maple (*Acer macrophyllum*), native shrubs of flowering currant (*Ribes sanguineum*), coffee berry (*Frangula californica*), coyote brush (*Baccharis pilularis*), red elderberry (*Sambucus racemosa*), and native forbs, such as sword fern, bracken fern, and hedge nettle (*Stachys sp.*). Non-native plant species are also present, such as rhododendrons, periwinkle (*Vinca major*), Italian thistle (*Carduus pycnocephalus*), bull thistle (*Cirsium vulgare*), French broom (*Genista monspessulana*), English ivy (*Hedera helix*), and boxwood. The character of the scrub is depicted in Figure 4.



Figure 4. Character of successional scrub on hillside

The berries of shrubs and the seeds of herbaceous plants in the scrub habitat provide forage for wildlife. Wildlife may perch on the outer perimeter of mixed scrub to take advantage of hunting opportunities in adjacent openings, and take cover in the denser shrub patches as needed. Common wildlife species found in scrub include western fence lizard (*Sceloporus occidentalis*), California thrasher (*Taxostoma redivivum*), California quail (*Callipepla californica*), California towhee (*Pipilo crissalis*), and white-crowned sparrow (*Zonotrichia leucophrys*).

Residential Landscaping

The property supports residential landscaping around the existing house and patio. In some areas, native trees from the adjacent mixed evergreen forest are also present, such as tan oaks. Typical landscape species observed include rhododendrons, privet (*Ligustrum sp.*), boxwood, cypress, camellia (*Camellia sp.*), fruit trees (*Prunus sp.*), and currant (*Ribes sp.*). A cleared area down slope of the residence supports annual weedy species, such as willow herb (*Epilobium ciliatum*), forget me-not (*Myosotis discolor*), wild lettuce (*Lactuca sp.*), milk thistle (*Silybum marianum*), and medic clover (*Medicago sp.*).

SENSITIVE BIOTIC RESOURCES

Sensitive Habitats

Sensitive habitats are defined by local, State, or Federal agencies as those habitats that support special status species, provide important habitat values for wildlife, represent areas of unusual or regionally restricted habitat types, and/or provide high biological diversity. CDFW classifies and ranks the State's natural

communities to assist in the determining the level of rarity and imperilment. Vegetation types are ranked between S1 and S5. For vegetation types with ranks of S1-S3, all associations within the type are considered to be highly imperiled. If a vegetation alliance is ranked as S4 or S5, these alliances are generally considered common enough to not be of concern; however, it does not mean that certain associations contained within them are not rare (CDFW, 2007 and 2010). No plant communities ranked S1-S3 occur on the property.

Special Status Plant Species

Plant species of concern include those listed by either the Federal or State resource agencies as well as those identified as rare by CNPS. Based on a search of the CNPS and CNDDDB inventories for the Woodside and surrounding 7.5⁷ quadrangles, a review of pertinent literature, and an evaluation of habitat suitability for each species, several special status plant species were considered to have the potential to occur in the vicinity of the property. These species are listed on the table below.

The property does not support serpentine-derived substrates therefore species endemic to serpentine substrates would not be present on the property, as noted in the table below. The December 2015 field survey was sufficient in determining presence or absence of special status woody, perennial species (i.e., trees and shrubs) as these species would be identifiable during this survey period. The winter field survey was also sufficient to determine the presence or absence of specialized microhabitats required by several special status species (i.e., serpentine, coastal prairie/grassland, limestone outcrops, and rocky outcrops). The project site was not observed to support any special status trees or shrubs. In addition, due to the lack of specialized microhabitats (i.e., lack of serpentine, rocky outcrops, and native grassland), it was determined that the site has a low likelihood of supporting special status herbaceous species. In summary, no species status plant species were observed, or are expected to occur, on the property.

The CNDDDB has a record for Kings Mountain manzanita (*Arctostaphylos regismontana*) from the project vicinity. Kings Mountain manzanita typically grows on rocky slopes and is associated with brittle-leaved manzanita (*Arctostaphylos crustacea*), huckleberry (*Vaccinium ovatum*), yerba santa (*Eriodictyon californicum*), poison oak (*Toxicodendron diversilobum*), toyon (*Heteromeles arbutifolia*), and interior live oak (*Quercus wislizeni*) (CNDDDB, 2015). The species can also grow in opening in wooded habitat that supports madrone, tan oak, Douglas fir, and coast live oak (CNDDDB, 2015). The closest record for this species is from “opposite Farwell's Rhododendron Nursery - (13040 Skyline Blvd)”. The occurrence was last documented in 2013. As no Kings Mountain manzanita was found on the subject property (which is the former Farwell's Rhododendron Nursery), the CNDDDB record most likely relates to a property opposite or across (east) of Skyline Boulevard and not the subject property.

Special Status Wildlife Species

Special status wildlife species include those listed, proposed or candidate species by the Federal or the State resource agencies as well as those identified as State species of special concern. In addition, all raptor nests are protected by Fish and Game Code, and all migratory bird nests are protected by the Federal Migratory Bird Treaty Act.

Special status wildlife species were evaluated for their potential presence in the project area as described in the table below. No special status wildlife are known from the project area and none are expected based on the habitats present.

Scientific Name	Common Name	Federal	State	CNPS Rank	General Habitat/Potential Occurrence on Site
Plant Species					
<i>Acanthomintha duttonii</i>	San Mateo thorn-mint	Endangered	Endangered	1B.1	Chaparral, valley and foothill grassland. No suitable habitat on site.
<i>Allium peninsulare</i> var. <i>franciscanum</i>	Franciscan onion	None	None	1B.2	Cismontane woodland, valley and foothill grassland. No suitable habitat on site.
<i>Arctostaphylos andersonii</i>	Anderson's manzanita	None	None	1B.2	Broadleaved upland forest, chaparral, north coast coniferous forest. Not observed
<i>Arctostaphylos regismontana</i>	Kings Mountain manzanita	None	None	1B.2	Broadleaved upland forest, chaparral, north coast coniferous forest. Not observed
<i>Astragalus pycnostachyus</i> var. <i>pycnostachyus</i>	coastal marsh milk-vetch	None	None	1B.2	Coastal dunes, coastal salt marshes, coastal scrub. No suitable habitat on site.
<i>Cirsium fontinale</i> var. <i>fontinale</i>	Crystal Springs fountain thistle	Endangered	Endangered	1B.1	Valley and foothill grassland, chaparral, cismontane woodland, meadows and seeps. No suitable habitat on site.
<i>Collinsia multicolor</i>	San Francisco collinsia	None	None	1B.2	Closed-cone coniferous forest, coastal scrub. No suitable habitat on site.
<i>Dirca occidentalis</i>	western leatherwood	None	None	1B.2	Broadleaved upland forest, chaparral, closed-cone coniferous forest, cismontane woodland, north coast coniferous forest, riparian forest, riparian woodland. Not observed
<i>Fritillaria liliacea</i>	fragrant fritillary	None	None	1B.2	Coastal scrub, valley and foothill grassland, coastal prairie, cismontane woodland. No suitable habitat on site.
<i>Hesperolinon congestum</i>	Marin western flax	Threatened	Threatened	1B.1	Chaparral, valley and foothill grassland. No suitable habitat on site.
<i>Lessingia arachnoidea</i>	Crystal Springs lessingia	None	None	1B.2	Coastal sage scrub, valley and foothill grassland, cismontane woodland. No suitable habitat on site.
<i>Malacothamnus arcuatus</i>	arcuate bush-mallow	None	None	1B.2	Chaparral, cismontane woodland. Not observed.
<i>Monolopia gracilens</i>	woodland woollythreads	None	None	1B.2	Chaparral, valley and foothill grassland, cismontane woodland, broadleaved upland forest, north coast coniferous forest. No suitable habitat on site.
<i>Pentachaeta bellidiflora</i>	white-rayed pentachaeta	Endangered	Endangered	1B.1	Valley and foothill grassland, cismontane woodland. No suitable habitat on site.
<i>Plagiobothrys chorisianus</i> var. <i>chorisianus</i>	Choris' popcornflower	None	None	1B.2	Chaparral, coastal scrub, coastal prairie. No suitable habitat on site.
<i>Silene verecunda</i> ssp. <i>verecunda</i>	San Francisco champion	None	None	1B.2	Coastal scrub, valley and foothill grassland, coastal bluff scrub, chaparral, coastal prairie. No suitable habitat on site.

Wildlife Species					
<i>Ambystoma californiense</i>	California tiger salamander	Threatened	Threatened		Central Valley DPS federally listed as threatened. Santa Barbara & Sonoma counties DPS federally listed as endangered. No suitable habitat on site.
<i>Antrozous pallidus</i>	pallid bat	None	None		Deserts, grasslands, shrublands, woodlands & forests. Most common in open, dry habitats with rocky areas for roosting. No suitable habitat on site.
<i>Bombus caliginosus</i>	obscure bumble bee	None	None		Coastal areas from Santa Barabara county to north to Washington state. No suitable habitat on site.
<i>Brachyramphus marmoratus</i>	marbled murrelet	Threatened	Endangered		Feeds near-shore; nests inland along coast from Eureka to Oregon border & from Half Moon Bay to Santa Cruz. No suitable habitat on site.
<i>Calicina minor</i>	Edgewood blind harvestman	None	None		Open grassland in areas of serpentine bedrock. No suitable habitat on site.
<i>Corynorhinus townsendii</i>	Townsend's big-eared bat	None	Candidate Threatened		Throughout California in a wide variety of habitats. Most common in mesic sites. No suitable habitat on site.
<i>Dipodomys venustus venustus</i>	Santa Cruz kangaroo rat	None	None		Silverleaf manzanita mixed chaparral in the Zayante Sand Hills ecosystem of the Santa Cruz Mountains. No suitable habitat on site.
<i>Emys marmorata</i>	western pond turtle	None	None		A thoroughly aquatic turtle of ponds, marshes, rivers, streams & irrigation ditches, usually with aquatic vegetation, below 6000 ft. elevation. No suitable habitat on site.
<i>Euphydryas editha bayensis</i>	Bay checkerspot butterfly	Threatened	None		Restricted to native grasslands on outcrops of serpentine soil in the vicinity of San Francisco Bay. No suitable habitat on site.
<i>Geothlypis trichas sinuosa</i>	saltmarsh common yellowthroat	None	None		Resident of the San Francisco Bay region, in fresh and salt water marshes. No suitable habitat on site.
<i>Hydrochara rickseckeri</i>	Ricksecker's water scavenger beetle	None	None		Aquatic. No suitable habitat on site.
<i>Lasiurus cinereus</i>	hoary bat	None	None		Prefers open habitats or habitat mosaics, with access to trees for cover & open areas or habitat edges for feeding. No suitable habitat on site.
<i>Microcina edgewoodensis</i>	Edgewood Park micro-blind harvestman	None	None		Open grassland in xeric environments. No suitable habitat on site.
<i>Neotoma fuscipes annectens</i>	San Francisco dusky-footed woodrat	None	None		Forest habitats of moderate canopy & moderate to dense understory. May prefer chaparral & redwood habitats. No dens/nests observed
<i>Oncorhynchus mykiss irideus</i>	steelhead - central California coast DPS	Threatened	None		From Russian River, south to Soquel Cr & to, but not including, Pajaro River. Also San Francisco & San Pablo Bay basins. No suitable habitat on site.

<i>Rana draytonii</i>	California red-legged frog	Threatened	None		Lowlands & foothills in or near permanent sources of deep water with dense, shrubby or emergent riparian vegetation. No suitable habitat on site.
<i>Thamnophis sirtalis tetrataenia</i>	San Francisco garter snake	Endangered	Endangered		Vicinity of freshwater marshes, ponds and slow-moving streams in San Mateo County & extreme northern Santa Cruz County. No suitable habitat on site.

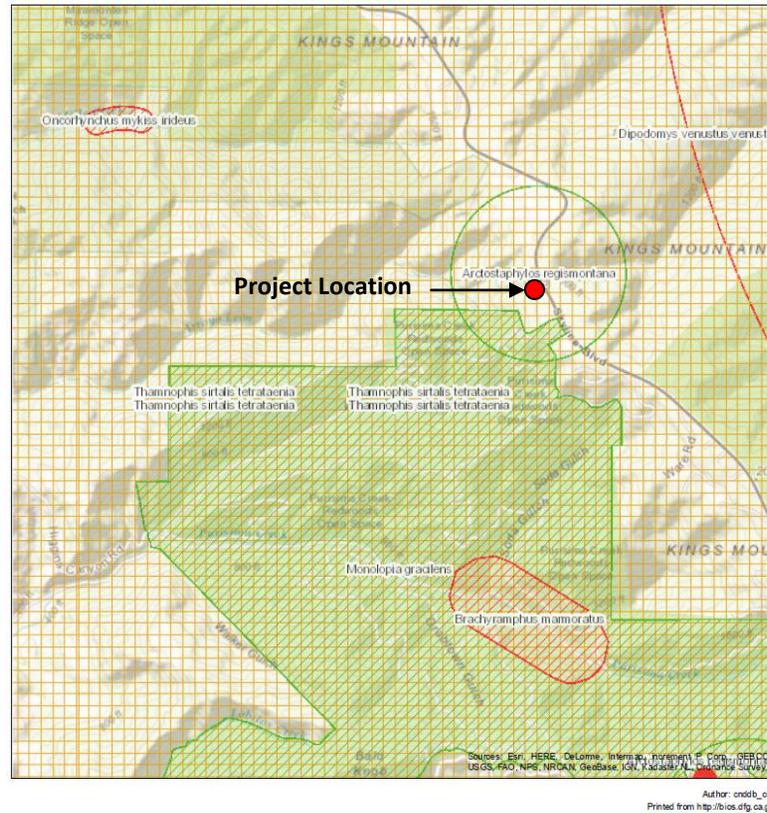


Figure 5. Mapped Occurrences of Special Status Plant Species, CNDDb, 2015

IMPACT AND MITIGATION DISCUSSION

IMPACT CRITERIA

The thresholds of significance presented in the California Environmental Quality Act (CEQA) and San Mateo County were used to evaluate project impacts and to determine if the proposed residential development poses significant impacts to biological resources.

For this analysis, significant impacts are those that substantially affect either:

- *Have a significant adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?*
- *Have a significant adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, and regulations or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?*
- *Have a significant adverse effect on federally protected wetlands as defined by Section 404 of the Clean Water Act (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means?*
- *Interfere significantly with the movement of any native resident or migratory fish or wildlife species or with established native resident migratory wildlife corridors, or impede the use of native wildlife nursery sites?*
- *Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance (including the County Heritage and Significant Tree Ordinances)?*
- *Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Conservation Community Plan, other approved local, regional, or State habitat conservation plan?*
- *Be located inside or within 200 feet of a marine or wildlife reserve?*

POTENTIAL IMPACTS AND MITIGATION MEASURES

The proposed residential development project was evaluated for its potential direct and indirect impacts to biotic resources, as per the criteria listed above.

The project site does support habitat for special status plant or wildlife species. No individuals of Kings Mountain manzanita, or other special status species, were found to occur on site.

The proposed project will require removal of mixed evergreen forest, successional scrub, and residentially-landscaped areas. None of these communities are identified as imperiled by CDFW. The property does not support any riparian habitat or wetlands.

The property supports numerous trees; however, none of the trees are designated as Class I heritage trees by the County. None of the trees appear to meet the requirements of Class II heritage trees due to their relatively small stature; none of the trees appear to meet the Class II size requirements for the applicable tree species (i.e., size requirements for big leaf maple, madrone, Douglas fir, oaks, or redwood). None of the trees appear to meet the size requirement for a significant tree (greater than 38" dbh), as per the County's ordinance.

The property is not located within an area subject to a Habitat Conservation Plan or Natural Conservation Community Plan or other adopted plan. The property is not located inside or within 200 feet of a marine or wildlife refuge.

Removal of vegetation to accommodate the residential development may impact nesting birds, if nesting birds are present at the time of tree removal or limbing. Nesting birds are to be protected under the Migratory Bird Treaty Act. The following measure is identified to avoid impacts to nesting birds.

Recommended Measure

1. Schedule all vegetation removal to occur between August 1 and March 1 of any given year, which is outside the bird nesting season. If this is not possible, the applicant shall hire a qualified biologist to conduct preconstruction nesting bird surveys no more than 2 weeks prior to vegetation disturbance or removal. If nesting birds are present and may be impacted by the vegetation removal, the biologist shall designate a buffer zone around the nest (e.g., 50 feet for passerines and 200 feet for raptors) where no vegetation removal will take place until the biologist has confirmed that all young have fledged the nest.

LITERATURE CITED AND REFERENCES

- Baldwin, B., D. Goldman, D. Keil, R Patterson, T Rosatti and D. Wilken, editors. 2012. The Jepson Manual: Vascular Plants of California. 2nd edition. University of California Press. Berkeley
- Barbour & Major, 1988. Terrestrial Vegetation of California. California Native Plant Society, Sacramento, CA
- California Native Plant Society, 2015. Electronic Inventory of Rare and Endangered Plants of California. Electronic Data Base. Los Gatos quadrangle and surrounding quadrangle search.
- California, State of, Department of Fish & Wildlife. 2015. Natural Diversity Data Base, Natural Communities. Rarefind 5 Program.
- California, State of, Department of Fish & Wildlife. 2010. The Vegetation Classification and Mapping Program, List of California Terrestrial Natural Communities Recognized by the CNDDDB. December 2010.
- NRCS/USDA, 2015. Web Soil Survey of San Mateo County, California. United States Department of Agriculture, Soil Conservation Service.

**GEOTECHNICAL INVESTIGATION
FOR
STERN RESIDENCE
13040 SKYLINE BOULEVARD
WOODSIDE, CALIFORNIA 94062**

November 2014

Prepared for

Mr. Henry Stern
13060 Skyline Boulevard
Woodside, California 94062

Project No. 3295-1

ROMIG ENGINEERS, INC.
GEOTECHNICAL & ENVIRONMENTAL SERVICES

Attachment F

November 17, 2014
3295-1

Mr. Henry Stern
13060 Skyline Boulevard
Woodside, California 94062

**RE: GEOTECHNICAL INVESTIGATION
NEW RESIDENCE
13040 SKYLINE BOULEVARD
WOODSIDE, CALIFORNIA**

Dear Mr. Stern:

In accordance with your request, we have performed a geotechnical investigation for your proposed residence to be constructed at 13040 Skyline Boulevard in an unincorporated area of San Mateo County near Woodside, California. The accompanying report summarizes the results of our subsurface exploration, laboratory testing, and engineering analysis, and presents our geotechnical recommendations for the proposed residence.

We refer you to the text of our report for specific recommendations.

Thank you for the opportunity to work with you on this project. Please call if you have questions or comments about site conditions or the findings and recommendations from our site investigation.

Very truly yours,

ROMIG ENGINEERS, INC.


Coleman K. Ng, P.E.




Glenn A. Romig, P.E.



Copies: Addressee (1)
WA Design (3)
Attn: Mr. David Wilson
WA Design (via email)
Attn: Mr. Chris Parlette

GAR:CN:dr

**GEOTECHNICAL INVESTIGATION
STERN RESIDENCE
13040 SKYLINE BOULEVARD
WOODSIDE, CALIFORNIA 94062**

**PREPARED FOR:
MR. HENRY STERN
13060 SKYLINE BOULEVARD
WOODSIDE, CALIFORNIA 94062**

**PREPARED BY:
ROMIG ENGINEERS, INC.
1390 EL CAMINO REAL, SECOND FLOOR
SAN CARLOS, CALIFORNIA 94070**

NOVEMBER 2014

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Figure B-1 - Plasticity Chart

**GEOTECHNICAL INVESTIGATION
FOR
STERN RESIDENCE
13040 SKYLINE BOULEVARD
WOODSIDE, CALIFORNIA**

INTRODUCTION

This report presents the results of our geotechnical investigation for your proposed residence to be constructed at 13040 Skyline Boulevard in an unincorporated area of San Mateo County near Woodside, California. The location of the site is shown on the Vicinity Map, Figure 1. The purpose of this investigation was to evaluate subsurface conditions at the site and to provide geotechnical recommendations for design and construction of the proposed residence.

Project Description

We understand that the project consists of constructing a new one- to two-story residence at your Woodside property. The main level of the residence, including an attached garage, is expected to have a footprint of about 2,700 square feet in plan dimension, and the upper floor is expected to be about 800 square feet. The residence is expected to be constructed on a relatively flat cut and fill building pad at an elevation of about 483 feet (project datum). A retaining wall that will retain up to about 14 feet of cut is planned along the upslope (east) side of the residence, while up to about 7 feet of fill will be placed along the downslope portion of the building pad. Two tiers of retaining walls approximately 2.5 and 6 feet in height are planned along the downslope side of the residence. No basement is planned. The existing residence that currently occupies the site will be demolished prior to construction.

Scope of Work

The scope of our work for this investigation was presented in our agreement with Mr. Henry Stern, dated October 13, 2014. In order to complete our investigation, we performed the following work:

- Review of geologic and geotechnical information in our files pertinent to the general area of the site.
- Subsurface exploration consisting of drilling, sampling, and logging of three exploratory borings in the area of the proposed residence.
- Laboratory testing of selected samples to aid in soil classification and to help evaluate the engineering properties of the near-surface soil and bedrock encountered at the site.
- Engineering analysis and evaluation of the surface and subsurface data to develop earthwork guidelines and foundation design criteria.
- Preparation of this report presenting our findings and geotechnical recommendations for the proposed residence.

Limitations

This report has been prepared for the exclusive use of Mr. Henry Stern for specific application in developing geotechnical design criteria for the proposed residence to be constructed at 13040 Skyline Boulevard in an unincorporated area of San Mateo County near Woodside, California. We make no warranty, expressed or implied, for the services we performed for this project. Our services are performed in accordance with the geotechnical engineering principles generally accepted at this time and location. This report was prepared to provide engineering opinions and recommendations only. In the event there are any changes in the nature, design, or location of the project, or if any future improvements are planned, the conclusions and recommendations presented in this report should not be considered valid unless: 1) the project changes are reviewed by us, and; 2) the conclusions and recommendations presented in this report are modified or verified in writing.

The analysis, conclusions, and recommendations presented in this report are based on site conditions as they existed at the time of our investigation; the currently planned improvements; review of readily available reports relevant to the site conditions; and laboratory test results. In addition, it should be recognized that certain limitations are inherent in the evaluation of subsurface conditions, and that certain conditions may not be detected during an investigation of this type. Changes in the information or data gained from any of these sources could result in changes in our conclusions or recommendations. If such changes occur, we should be advised so that we can review our report in light of those changes.

SITE EXPLORATION AND RECONNAISSANCE

Site reconnaissance and subsurface exploration were performed on October 17, 2014. Subsurface exploration was performed using portable Minuteman drilling and sampling equipment. Three exploratory borings were advanced to depths ranging from 8.4 to 12 feet. The approximate locations of the borings are shown on the Site Plan, Figure 2. The boring logs and the results of our laboratory tests performed on samples collected during our investigation are attached in Appendices A and B, respectively.

Surface Conditions

The site is located in a rural/residential area along the southwest side of Skyline Boulevard. At the time of our investigation, the site was occupied by a split-level, wood frame residence which had a wood siding exterior. An asphalt concrete driveway was located along the south side of the front (east) portion of the site providing access to Skyline Boulevard. Concrete patios were located on the front and rear side of the residence. A raised wood deck was along the rear side of the residence. The site was landscaped with native grass, small to large shrubs, and small to large trees.

The property is situated on a west facing hillside near the top of a ridgeline. The front portion of the site, including the building pad of the existing residence, slopes down gently toward the west at an average inclination of about 6:1 (horizontal:vertical), while the rear portion of the site generally slopes down moderately to steeply toward the west at inclinations ranging from about 1:1 to 4:1 (H:V). The building pad is terraced by two concrete block retaining walls ranging from about 3 to 7 feet in height. The rear portion of the site appears to be located within the uppermost portion of a natural drainage swale which sloped down toward the west at an average inclination of about 2:1 (H:V). The rear steep slope is about 500 feet high, and toes at another drainage swale trending from southeast to northwest.

The depth and width of the existing residence foundations are unknown. The perimeter stem wall of the residence was generally covered by the siding and not visible. The driveway and concrete patio appeared to be serviceable condition, although cracks up to about 1/2-inch wide were observed at various locations.

Subsurface Conditions

At the locations of our exploratory borings, we generally encountered about 2 to 4 feet of stiff sandy lean clay/silt of low plasticity overlying sandstone and siltstone bedrock of the Whiskey Hill Formation to the maximum depths explored. In Boring EB-2, we also encountered about 1 foot of gravelly sand near the ground surface. The gravelly sand in Boring EB-2 and approximately the upper 2 feet of sandy clay/silt in Boring EB-3 appeared to be fill materials.

A Liquid Limit of 28 and a Plasticity Index of 6 were measured on a sample of near-surface native soil recovered from Boring EB-3. These test results indicate the near-surface soils have a low plasticity and a low potential for expansion. Free-swell values ranging from about 30 to 50 percent were measured on three samples of siltstone bedrock. These free-swell test results along with our local experience indicate that the bedrock at the project site has a relatively low potential for expansion.

Ground Water

Ground water was not encountered in our borings during drilling and sampling. Since the borings were backfilled with grout immediately after drilling and sampling was completed, sufficient time may not have been allowed for ground water to seep into the borings. Please be cautioned that fluctuations in the level of ground water can occur due to variations in rainfall, local surface and subsurface drainage patterns, landscaping, and other factors. It is possible and perhaps likely that seasonal ground water conditions may develop in the soils and near the surface of the bedrock during and after significant rainfall or due to landscape watering at the property and the upslope areas.

GEOLOGIC SETTING

As part of our investigation, we briefly reviewed our local experience and geologic information in our files pertinent to the general area of the site. The information reviewed indicates the site is located in an area underlain by Middle and Lower Eocene age bedrock (Tw) of the Whiskey Hill Formation, formerly the Butano Formation (Brabb, Graymer, Jones, 1998). This formation is expected to consist primarily of light-gray to buff coarse-grained arkosic sandstone, with light-gray to buff silty claystone, glauconitic sandstone, and tuffaceous siltstone. Sandstone beds constitute about 30 percent of the map unit. Tuffaceous and silty claystone beds are expansive. Locally, sandstone beds are well cemented with calcite. In places within this map unit, sandstone and claystone beds are chaotically disturbed. The geology in the general area of the site is shown on the Vicinity Geologic Map, Figure 3.

In addition, the Association of Bay Area Governments (ABAG) landslide map indicates that an approximately 1,300-foot wide, 3,800-long old landslide is located about 100 feet southwest of the proposed residence. The old landslide appears to trend from southeast to northwest, and is located at least 300 feet southwest of Skyline Boulevard. At the time of our site visit, no obvious signs of slope failure were noted at or near the area of the proposed residence. Please note that evaluation of the existing landslide and slope southwest of the residence was not included in our scope of services.

The lot and immediate site vicinity are located near the top of a hillside that generally slopes down moderately toward the west. The site for the proposed residence is located at elevations ranging from approximately 1980 feet to 2015 feet above sea level.

Faulting and Seismicity

There are no mapped through-going faults within or adjacent to the site and the site is not located within a State of California Earthquake Fault Zone (formerly known as a Special Studies Zone), an area where the potential for fault rupture is considered probable. The closest active fault is the San Andreas Fault, located approximately 2.0 miles northeast of the property. Thus, the likelihood of surface rupture occurring from active faulting at the site is low.

The San Francisco Bay Area is, however, an active seismic region. Earthquakes in the region result from strain energy constantly accumulating because of the northwestward movement of the Pacific Plate relative to the North American Plate. On average about 1.6-inches of movement occur per year. Historically, the Bay Area has experienced large, destructive earthquakes in 1838, 1868, 1906 and 1989. The faults considered most likely to produce large earthquakes in the area include the San Andreas, San Gregorio, Hayward, and Calaveras faults. The San Gregorio fault is located approximately 6.2 miles southwest of the site. The Hayward and Calaveras faults are located approximately 21 and 28 miles northeast of the site, respectively. These faults and significant earthquakes that have been documented in the Bay Area are listed below in Table 1.

**Table 1. Earthquake Magnitudes and Historical Earthquakes
Stern Residence
Woodside, California**

<u>Fault</u>	<u>Maximum Magnitude (Mw)</u>	<u>Historical Earthquakes</u>	<u>Estimated Magnitude</u>
San Andreas	7.9	1989 Loma Prieta	6.9
		1906 San Francisco	7.9
		1865 N. of 1989 Loma Prieta Earthquake	6.5
		1838 San Francisco-Peninsula Segment	6.8
		1836 East of Monterey	6.5
Hayward	7.1	1868 Hayward	6.8
		1858 Hayward	6.8
Calaveras	6.8	1984 Morgan Hill	6.2
		1911 Morgan Hill	6.2
		1897 Gilroy	6.3
San Gregorio	7.3	1926 Monterey Bay	6.1

In the future, the subject property will undoubtedly experience severe ground shaking during moderate and large magnitude earthquakes produced along the San Andreas or other active Bay Area fault zones. The Working Group On California Earthquake Probabilities, a panel of experts that are periodically convened to estimate the likelihood of future earthquakes based on the latest science and information, concluded there is a 63 percent chance for at least one earthquake of Magnitude 6.7 or larger in the Bay Area before 2038 (Working Group, 2008). The San Andreas Fault has the second highest likelihood of a large earthquake in the Bay Area, estimated as a 21 percent chance of a Magnitude 6.7 or larger earthquake by 2038, while the Hayward fault has the highest likelihood of a similar event (31 percent).

Earthquake Design Parameters

The State of California currently requires that all structures be designed in accordance with the seismic design provisions presented in the 2013 California Building Code and in ASCE 7-10, "Minimum Design Loads for Buildings and Other Structures." Based on site geologic conditions and on information from our subsurface exploration at the site, the site may be classified as Site Class C, very dense soil and soft rock, in accordance with Chapter 20 of ASCE 7-10. Spectral acceleration response parameters S_S and S_1 , and site coefficients F_a and F_v , may be taken directly from the U.S.G.S. website based on the latitude and longitude of the site. For the site latitude (37.4528) and longitude (-122.3408) and Site Class C, $F_a = 1.0$, $F_v = 1.3$, $SD_s = 1.431g$, and $SD_1 = 0.884g$.

Geologic Hazards

As part of our investigation, we reviewed the potential for geologic hazards to impact the site and the proposed residence and other improvements, considering the geologic setting and the soils encountered during our investigation. The results of our review are presented below.

- **Fault Rupture** - The site is not located in an Earthquake Fault Zone or area where fault rupture is considered likely. Therefore, active faults are not believed to exist beneath the site and the potential for fault rupture at the site is low.
- **Ground Shaking** - The site is located in an active seismic area. Moderate to large earthquakes are probable along several active faults in the greater Bay Area over a 30 to 50 year design life. Strong ground shaking should therefore be expected several times during the design life of the development, as is typical for sites throughout the Bay Area. The residence and other improvements should be designed in accordance with current earthquake resistance standards.

- Liquefaction - Liquefaction occurs when saturated, sandy soils lose strength during earthquake shaking. Ground deformation and settlement often accompany liquefaction. The soils most susceptible to liquefaction are saturated, loose, silty sands, sandy silts, and uniformly graded sands. Since weathered bedrock was encountered at a relatively shallow depth across the project site during our investigation, the likelihood of damage from liquefaction occurring at the site is negligible. The site is also not located within a State liquefaction hazard zone.
- Differential Compaction - Differential compaction occurs during moderate and large earthquakes when soft or loose, natural or fill soils are densified and settle, often unevenly across a site. Since weathered bedrock was encountered at a relatively shallow depth across the project site, in our opinion, the likelihood of significant differential compaction affecting the residence is low provided the proposed fills are well compacted and the recommendations presented in our report are followed during design and construction.
- Slope Stability - An old landslide is mapped southwest of the proposed residence site on the ABAG landslide map. While the landslide was not evaluated as part of this study, we expect that a potential for future movement and possibly upslope progression of the slide exists. However, since the landslide is mapped about 100 feet away from the proposed residence, in our opinion, future movement and head scarp upslope progression are unlikely to impact the proposed new residence. In addition, provided that the proposed residence and site retaining walls (along the downslope side of the residence) will be supported on a deep foundation system that will extend well into weathered bedrock, in our opinion, significant damage to the proposed residence from the upslope progression of the old landslide is expected to be low.

CONCLUSIONS

From a geotechnical viewpoint, the site is suitable for the proposed residence, provided the recommendations presented in our report are followed during design and construction. The primary geotechnical concerns at the site are the moderately steep sloping nature of the site and the potential for severe ground shaking during a major earthquake. In our opinion, the proposed residence and site retaining walls along the downslope side of the residence should be supported on a drilled pier foundation bearing in weathered bedrock below any fill or colluvial soils. As an alternative to drilled piers, the proposed site retaining wall along the upslope side of the residence that will retain cuts into bedrock may be supported on a shallow foundation. Specific geotechnical recommendations for the proposed improvements are presented in the following sections of this report.

Because subsurface conditions may vary from those encountered at the locations of our borings, and to observe that our recommendations are properly implemented, we recommend that we be retained to 1) review the project plans for conformance with our recommendations; and 2) observe and test during earthwork and foundation construction.

FOUNDATIONS

Pier and Grade Beam Foundation

In our opinion, the proposed residence and site retaining walls should be supported on a pier and grade beam foundation bearing in weathered bedrock. Piers should be at least 16 inches in diameter and extend at least 12 feet below the bottom of the grade beam, and at least 10 feet into weathered bedrock, whichever is deeper. However, if bedrock is exposed at the subgrade surfaces (within the upslope, cut portion of the building pad), the minimum pier length may be reduced to at least 10 feet below the grade beam from a geotechnical viewpoint.

In addition, for the downslope (fill) portion of the building pad, piers should also extend into the bedrock to a depth equal to at least 1.5 times the combined thickness of the fill and soil overburden present at each pier location, even if this requires a deeper embedment depth (i.e., in areas where 7 feet of fill will be placed over 3 feet of native colluvial soil, piers will need to extend at least 15 feet into weathered bedrock, with a total depth of at least 25 feet below finished grade).

The piers may be designed for an allowable skin friction of 550 pounds per square foot for dead plus live loads, with a one-third increase allowed when considering additional short-term wind or seismic loading. The uplift capacity of the piers may be based on a skin friction value of 400 pounds per square foot. The vertical resistance of the upper 3 feet, taken from current site grades, should be neglected in design. The vertical resistance within the proposed fill soil should also be neglected in design.

Piers should be reinforced with the equivalent of at least four No. 5 bars in the vertical direction and/or as determined by the structural engineer to resist bending from lateral loads. The piers should have a center to center spacing of at least three pier diameters or the pier capacity may need to be reduced due to group effects.

In order to improve long term performance of the pier foundations, a series of relatively rigid grade beams should be provided between piers supporting the proposed structures as required by the structural engineer. The grade beam below the residence should extend at least 8 inches below the crawl space grade or slab subgrade elevation.

Pier drilling should be observed by a member of our staff to confirm that the pier holes extend at least the required minimum depth into bedrock and are properly cleaned of all loose or soft soil and debris. The minimum pier depths recommended above may require adjustment if differing conditions are encountered during drilling. While we expect that moderate to large sized drilling equipment can achieve the required minimum pier embedment depth, a rock bit equipped with carbide or other teeth or a rock core barrel will probably be required due to the hardness of the bedrock present below the site.

Concrete should be placed in the pier holes as soon as practical after drilling, preferably the same day they are drilled. Ground water may seep into the pier holes during pier drilling and it is possible that ground water seepage could cause some sloughing or caving of the pier holes. This can be further evaluated during drilling of the initial piers. If ground water cannot be effectively pumped from the pier holes, concrete will need to be placed in the pier holes by the tremie method.

Lateral Loads for Drilled Piers

Due to the potential for lateral creep of the near-surface soils for piers to be constructed within the portion of the building pad underlain by fill and native soils (i.e., approximately the western one-third of the building pad), we recommend that the upper 4 feet of these piers be designed to resist an active soil pressure equal to 85 pounds per cubic foot, acting against 1.5 times the projected area of the piers in the downhill direction. The active load and other lateral loads may be resisted by passive earth pressure based upon an equivalent fluid pressure of 400 pounds per cubic foot, acting on 1.5 times the projected area of the pier in native soil and bedrock below a depth of 5 feet. The passive resistance of the upper 5 feet of the surface or fill soils should be neglected.

For piers to be constructed within the eastern two-thirds of the building pad, lateral loads on the piers may be resisted by passive earth pressure based upon an equivalent fluid pressure of 400 pounds per cubic foot, acting on 1.5 times the projected area of the pier. The passive resistance of the upper 1 foot of the pier should be neglected.

Where closely spaced walls are planned, the passive pressure values may need to be adjusted to account for surcharge effects from the upper wall.

Settlement for Drilled Piers

Thirty-year differential settlement due to static loads is not expected to exceed 1/2-inch across the proposed residence supported on a drilled pier and grade beam foundation, provided the foundations for the structure are designed and constructed as recommended.

Spread Footing Foundation

As an alternative to drilled piers, site retaining walls along the upslope side of the residence that will retain cuts with level ground at their base may be supported on conventional spread footing foundation bearing in undisturbed weathered rock. Footings should have a width of at least 18 inches and should extend at least 24 inches below exterior grade and at least 18 inches below the bottom of exterior flatwork, whichever is deeper. Footings should also extend at least 6-inches into competent bedrock, even if it requires a deeper embedment than stated above.

Footings with at least these minimum dimensions may be designed for an allowable bearing pressure of 4,000 pounds per square foot for dead plus live loads, with a one-third increase allowed when considering additional short-term wind or seismic loading.

All footings located adjacent to utility lines should be embedded below a 1:1 plane extending up from the bottom edge of the utility trench. All continuous footings should be reinforced with top and bottom steel, to provide structural continuity and to permit spanning of local irregularities.

A member of our staff should observe the footing excavations prior to placement of reinforcing steel to confirm that they expose suitable bearing material, extend at least the minimum required depth below grade, and have been properly cleaned. If fill or native soils or weak bedrock are encountered in the foundation excavations, our field representative will require this material to be removed and a deeper footing embedment depth before reinforcing steel is placed.

Lateral Loads for Footings

Lateral loads may be resisted by friction between the bottom of the footings and the supporting weathered bedrock. A coefficient of friction of 0.3 may be assumed. In addition, lateral resistance may be provided by passive soil pressure acting against the sides of foundations cast neat in footing excavations or backfilled with compacted structural fill. We recommend assuming an equivalent fluid pressure of 350 pounds per cubic foot for passive soil resistance, where appropriate. The upper foot of passive soil resistance should be neglected where soil adjacent to the footing is not covered and protected by a relatively level concrete slab or pavement.

Settlement for Footings

Thirty-year differential settlement due to static loads is not expected to exceed 3/4-inch across the proposed improvements supported on spread footings, provided the foundations for the structure are designed and constructed as recommended.

SLABS-ON-GRADE**General Slab Considerations**

To reduce the potential for movement of the slab subgrade, at least the upper 6-inches of surface soil should be scarified and compacted at a moisture content slightly above the laboratory optimum. The native soil subgrade should be kept moist up until the time the non-expansive fill, crushed rock and vapor barrier, and/or aggregate base is placed. Slab subgrades and non-expansive fill should be prepared and compacted as recommended in the section of this report titled "Earthwork." Exterior flatwork and interior slabs-on-grade should be underlain by a layer of non expansive fill as discussed below. The non-expansive fill should consist of aggregate base rock or a clayey soil with a plasticity index of 15 or less.

Considering the potential for some movement of the surface soils, we expect that a reinforced slab will perform better than an unreinforced slab. Consideration should also be given to using a control joint spacing on the order of 2 feet in each direction for each inch of slab thickness.

Exterior Flatwork

Concrete walkways and exterior flatwork should be at least 4 inches thick and should be constructed on at least 6 inches of Class 2 aggregate base. To improve performance, exterior slabs-on-grade, such as for patios, may be constructed with a thickened edge to improve edge stiffness and to reduce the potential for water seepage under the edge of the slabs and into the underlying base and subgrade. In our opinion, the thickened edges should be at least 8 inches wide and ideally should extend at least 4 inches below the bottom of the underlying aggregate base layer.

Interior Slabs

Concrete slab-on-grade floors should be constructed on a layer of non-expansive fill at least 6 inches thick. In areas where dampness of concrete floor slabs would be undesirable, such as within the garage and/or building interior, concrete slabs should be underlain by at least 6 inches of free-draining gravel, such as 1/2- to 3/4-inch clean crushed rock with no more than 5 percent passing the ASTM No. 200 sieve.

Pea gravel should not be used for this capillary break material. The crushed rock layer should be densified and leveled with vibratory equipment, and may be considered as the non-expansive fill recommended above.

To reduce vapor transmission up through concrete floor slabs, the crushed rock section should be covered with a high quality vapor barrier conforming to the requirements of ASTM E 1745 Class A, with a water vapor transmission rate less than or equal to 0.01 perms (such as 15-mil thick "Stego Wrap Class A") should be used. The vapor barrier should be placed directly below the concrete slab. Sand above the vapor barrier is not recommended. The vapor barrier should be installed in accordance with ASTM E 1643. All seams and penetrations of the vapor barrier should be sealed in accordance with manufacturer's recommendations.

The permeability of concrete is effected significantly by the water:cement ratio of the concrete mix, with lower water:cement ratios producing more damp-resistant slabs and stronger concrete. Where moisture protection is important and/or where the concrete will be placed directly on the vapor barrier, the water:cement ratio should be 0.45 or less. To increase the workability of the concrete, mid-range plasticizers can be added to the mix. Water should not be added to the concrete mix unless the slump is less than specified and the water:cement ratio will not exceed 0.45. Other steps that may be taken to reduce moisture transmission through the concrete slabs-on-grade include moist curing for 5 to 7 days and allowing the slab to dry for a period of two months or longer prior to placing floor coverings. Also, prior to installation of the floor covering, it may be appropriate to test the slab moisture content for adherence to the manufacturer's requirements and to determine whether a longer drying time is necessary.

RETAINING WALLS

Retaining walls should be designed to support adjacent native material, fill, and backfill. Retaining walls with level backfill that are not free to deflect or rotate, such as retaining walls as part of (or structurally connected to) the residence, should be designed to resist an equivalent fluid pressure of 45 pounds per cubic foot plus an additional uniform lateral pressure of $8H$ in pounds per square foot, where H is the height of the wall in feet. Retaining walls with level backfill that are free to rotate, such as site retaining walls structurally separated from the residence, may be designed to resist an equivalent fluid pressure of 45 pounds per cubic foot.

Walls with sloping backfill should be designed for an additional equivalent fluid pressure of 1 pound per cubic foot for every 1.5 degree of slope inclination. Where retaining walls will be subjected to surcharge loads, such as from adjacent foundations, vehicle loads, or construction, the walls should be designed for an additional uniform lateral pressure equal to one-half of the surcharge pressure.

We understand that two tiers of retaining walls are planned along the downslope side of the residence. If the two walls will be spaced closely to each other, the lower wall may need to be designed with the additional surcharge loads from the upper wall. After the layouts and heights of the walls are determined, we can provide additional guideline as needed.

Based on the site peak ground acceleration (PGA), on Seed and Whitman (1970); Al Atik and Sitar (2010); and Lew et al. (2010); seismic loads on retaining walls that can yield may be simulated by a line load of $14H^2$ (in pounds per foot, where H is the wall height in feet). Seismic loads on walls that cannot yield (such as walls as part of the residence) may be subjected to a seismic load as high as about $20H^2$. This seismic surcharge line load should be assumed to act at $1/3H$ above the base of the wall (in addition to the active wall design pressure of 45 pounds per cubic foot for level wall backfill, with additional 1 pound per cubic foot for every 1.5 degree of slope inclination for sloping backfill).

To prevent buildup of water pressure from surface water infiltration, a subsurface drainage system should be installed behind the walls. The drainage system should consist of a 4-inch diameter perforated pipe (perforations placed down) embedded in a section of 1/2- to 3/4-inch, clean, crushed rock at least 12 inches wide. Backfill above the perforated drain line should also consist of 1/2- to 3/4-inch, clean, crushed rock to within about 1½ to 2 feet below exterior finished grade. A filter fabric should be wrapped around the crushed rock to protect it from infiltration of native soil. The upper 1½ to 2 feet of backfill should consist of compacted native soil. The perforated pipe should discharge into a free-draining outlet or sump that pumps to a suitable location. Damp-proofing of the walls should be included in areas where wall dampness and efflorescence would be undesirable.

Miradrain, Enkadrain or other drainage fabrics approved by our office may be used for wall drainage as an alternative to the gravel drainage system described above. If used, the drainage fabric should extend from a depth of about 1 foot below the top of the wall backfill down to the drain pipe at the base of the wall. A minimum 12-inch wide section of ½-inch to ¾-inch clean crushed rock and filter fabric should be placed around the drainpipe, as recommended previously.

Backfill placed behind the walls should be compacted to at least 90 percent relative compaction using light compaction equipment. If heavy equipment is used for compaction of wall backfill, the walls should be temporarily braced. The backfill behind the walls should be placed on level benches, rather than directly on the sloping grade.

Retaining walls to be built at grade should be supported on drilled piers designed in accordance with the recommendations presented in the above section titled "Drilled Piers." Site retaining walls that will retain cuts into bedrock with level ground at their base however may be supported on shallow foundations designed as recommended previously. During design, we can provide additional guideline regarding foundation support for site walls.

DRIVEWAY PAVEMENT

For light residential type traffic using asphalt concrete, we recommend the driveway pavement section consist of at least 3 inches of asphalt concrete on at least 8 inches of Class 2 aggregate base.

If the driveway will be constructed with Portland cement concrete (PCC), we recommend the driveway pavement consist of at least 5 inches of PCC on at least 8 inches of Class 2 aggregate base. Concrete for the 5-inch-thick driveway pavement should have a 28-day compressive strength of at least 3,500 psi. PCC pavements should be laterally constrained with curbs or shoulders and sufficient control joints should be incorporated in the design and construction to limit and control cracking.

The soil subgrade and aggregate base below the pavement section should be prepared and compacted as recommended previously. The use of a moisture cut-off or thickened edge along the edges of the driveway would be desirable in order to reduce water seepage below the edges of the driveway and into the underlying aggregate base and subgrade, which can lead to premature pavement distress.

EARTHWORK

Clearing and Subgrade Preparation

All deleterious materials, existing foundations, topsoil, roots, slabs, pavement, fill soils, vegetation, designated utility lines, etc., should be cleared from the areas to be built or paved on. Excavations which extend below finish grade should be backfilled with structural fill and compacted as discussed below.

After the site has been properly cleared, stripped, and excavated to the required grades, the exposed surface soil in areas to receive structural fill or slabs-on-grade, should be scarified to a depth of 6 inches, moisture conditioned, and compacted to the specifications for structural fill, listed below under section titled "compaction."

Please note that large fills are generally not desirable on a hillside site like this. Where fill are to be constructed on natural slopes (not retained by retaining walls) having an inclination steeper than 6 horizontal to 1 vertical, the fill should be benched, and a key excavated into the underlying bedrock. Subdrains should be installed during the grading as required by our representative in the field. We should be contacted to evaluate feasibility and for additional benching input if significant fills are required on slopes.

Material For Fill

All on-site soil containing less than 3 percent organic material by volume (ASTM D2974) is suitable for use as structural fill. However, structural fill placed at the site, should not contain rocks or pieces larger than 6 inches in greatest dimension, and contain no more than 15 percent larger than 2.5 inches. Imported and non-expansive fill should have a plasticity index of less than 15 percent or be predominately granular. Our representative should approve import materials prior to their use on-site.

Temporary Slopes and Excavations

The contractor should be responsible for the design and construction of all temporary slopes and any required shoring. Shoring and bracing should be provided in accordance with all applicable local, state and federal safety regulations, including the current OSHA excavation and trench safety standards.

Because of the potential for variation of the on-site soils, field modification of temporary slopes may be required. Unstable materials encountered on slopes and trenches during and after excavation should be trimmed off even if this requires cutting the slopes back to a flatter inclination.

Protection of the structures near excavations and trenches will also be the responsibility of the contractor. In our experience, a preconstruction survey is generally performed to document existing conditions prior to construction, with intermittent monitoring of the structures during construction.

Finished Slopes

We recommend that new finished slopes be cut or filled to an inclination preferably no steeper than 2.5:1 (horizontal:vertical). Exposed slopes may be subject to minor sloughing and erosion that would require periodic maintenance. We recommend that all slopes and soil surfaces disturbed during construction be planted with erosion resistant vegetation.

Compaction

Scarified soil surfaces and all structural fill should be placed and compacted in uniform lifts no thicker than 8 inches in pre-compacted thickness, conditioned to the appropriate moisture content, and compacted as recommended for structural fill in Table 2 below. The relative compaction and moisture content recommended in Table 2 is relative to ASTM Test D1557, latest edition.

**Table 2. Compaction Recommendations
Stern Residence
Woodside, California**

	<u>Relative Compaction*</u>	<u>Moisture Content*</u>
<u>General</u>		
• Scarified subgrade in areas to receive structural fill.	90 percent	Near optimum
• Structural fill composed of native soil.	90 percent	Near optimum
• Structural fill composed of non-expansive fill.	90 percent	Near optimum
• Structural fill below a depth of 4 feet.	93 percent	Near optimum
<u>Pavement Areas</u>		
• Upper 6-inches of soil below baserock.	95 percent	Near optimum
• Aggregate baserock.	95 percent	Near optimum
<u>Utility Trench Backfill</u>		
• On-site soil.	90 percent	Near optimum
• Imported sand	95 percent	Near optimum

* Relative to ASTM Test D1557, latest edition.

Surface Drainage

Finished grades should be designed to prevent ponding and to drain surface water away from foundations and edges slabs and pavements, and toward suitable collection and discharge facilities. Slopes of at least 2 percent are recommended for flatwork and pavement areas with 5 percent preferred in landscape areas within 8 feet of the structures, where possible. At a minimum, splash blocks should be provided at the ends of downspouts to carry surface water away from perimeter foundations. Preferably, downspout drainage should be collected in a closed pipe system that is routed to a storm drain system or other suitable discharge outlet.

Drainage facilities should be observed to verify that they are adequate and that no adjustments need to be made, especially during the first two years following construction. We recommend preparing an as-built plan showing the locations of surface and subsurface drain lines and clean-outs. The drainage facilities should be periodically checked to verify that they are continuing to function properly. It is likely the drainage facilities will need to be periodically cleaned of silt and debris that may build up in the lines.

FUTURE SERVICES**Plan Review**

Romig Engineers should review the completed grading and foundation plans for conformance with the recommendations contained in this report. We should be provided with these plans as soon as possible upon completion in order to limit the potential for delays in the permitting process that might otherwise be attributed to our review process. In addition, it should be noted that many of the local building and planning departments now require "clean" geotechnical plan review letters prior to acceptance of plans for their final review. Since our plan reviews typically result in recommendations for modification of the plans, our generation of a "clean" review letter often requires two iterations. At a minimum, we recommend that the following note be added to the plans:

"Earthwork, foundation and grade beam construction, pier drilling, retaining wall drainage and backfilling, slab subgrade and non-expansive fill preparation, utility trench backfill, pavement construction, and site drainage should be performed in accordance with the geotechnical report prepared by Romig Engineers, Inc., dated November 17, 2014. Romig Engineers should be notified at least 48 hours in advance of earthwork and foundation construction and should observe and test during earthwork and foundation construction as recommended in the geotechnical report."

Construction Observation and Testing

The earthwork and foundation phases of construction should be observed and tested by us to 1) Establish that subsurface conditions are compatible with those used in the analysis and design; 2) Observe compliance with the design concepts, specifications and recommendations; and 3) Allow design changes in the event that subsurface conditions differ from those anticipated. The recommendations in this report are based on a limited number of borings. The nature and extent of variation across the site may not become evident until construction. If variations are then exposed, it will be necessary to reevaluate our recommendations.



REFERENCES

American Society of Civil Engineers, 2010, Minimum Design Loads for Buildings and Other Structures, ASCE Standard 7-10.

Association of Bay Area Governments (ABAG), 2014, Interactive Existing Landslide Map, <http://resilience.abag.ca.gov/landslides/>

Brabb, E.E., Graymer, R.W. and Jones, D.L., 2000, Geology of the Onshore Part of San Mateo County, California, U.S. Geological Survey Open File Map 98-137.

California Building Standards Commission, and International Code Council, 2013 California Building Code, California Code of Regulations, Title 24, Part 2.

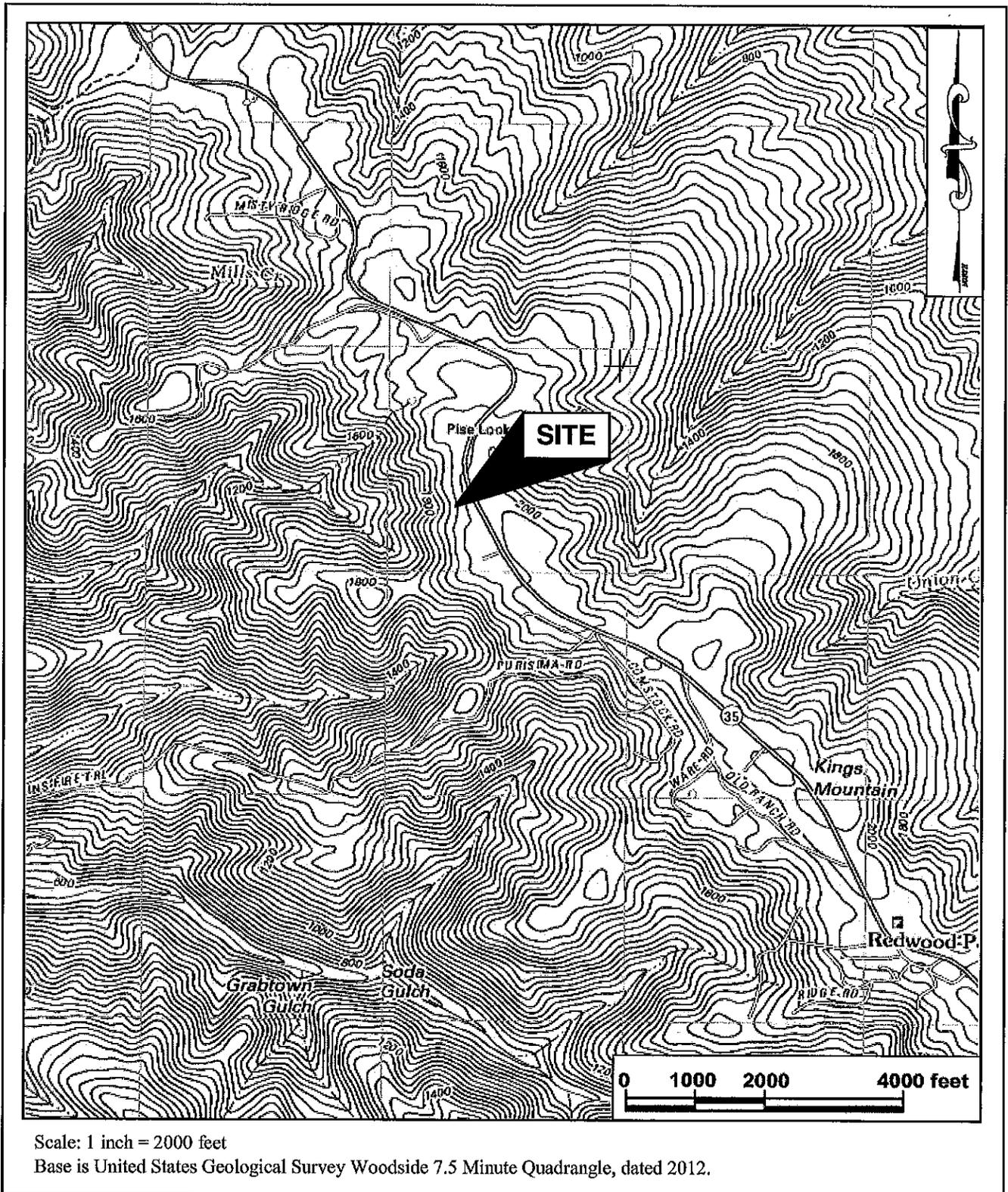
California Department of Conservation, Division of Mines and Geology (DMG), 1994, Fault-Rupture Hazard Zones in California, Special Publication 42.

California Geological Survey, 2011, Probabilistic Seismic Hazards Mapping Ground Motion Page, <http://redirect.conservation.ca.gov/cgs/rghm/pshamap/pshamap.asp/>

United States Geological Survey, 2014, United States Seismic Design Maps, <http://earthquake.usgs.gov/designmaps/us/application.php>

Working Group on California Earthquake Probabilities (WACE), 2008, The Uniform California Earthquake Rupture Forecast, Version 2 (CERF 2), U.S. Geological Survey Circular Open File Report 2007-1437.





VICINITY MAP
STERN RESIDENCE
WOODSIDE, CA

FIGURE 1
 NOVEMBER 2014
 PROJECT NO. 3295-1

SITE PLAN
STERN RESIDENCE
WOODSIDE, CA

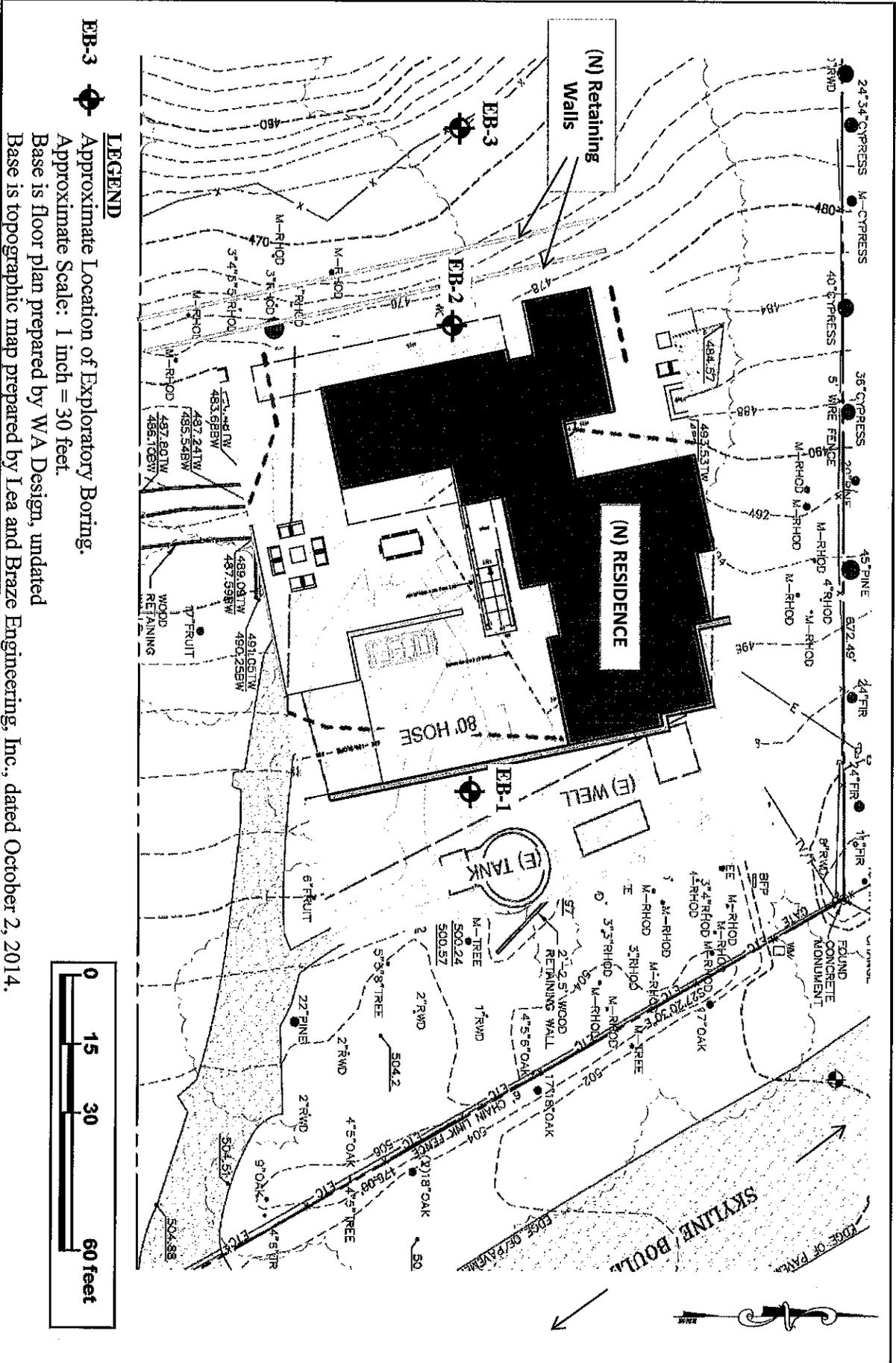
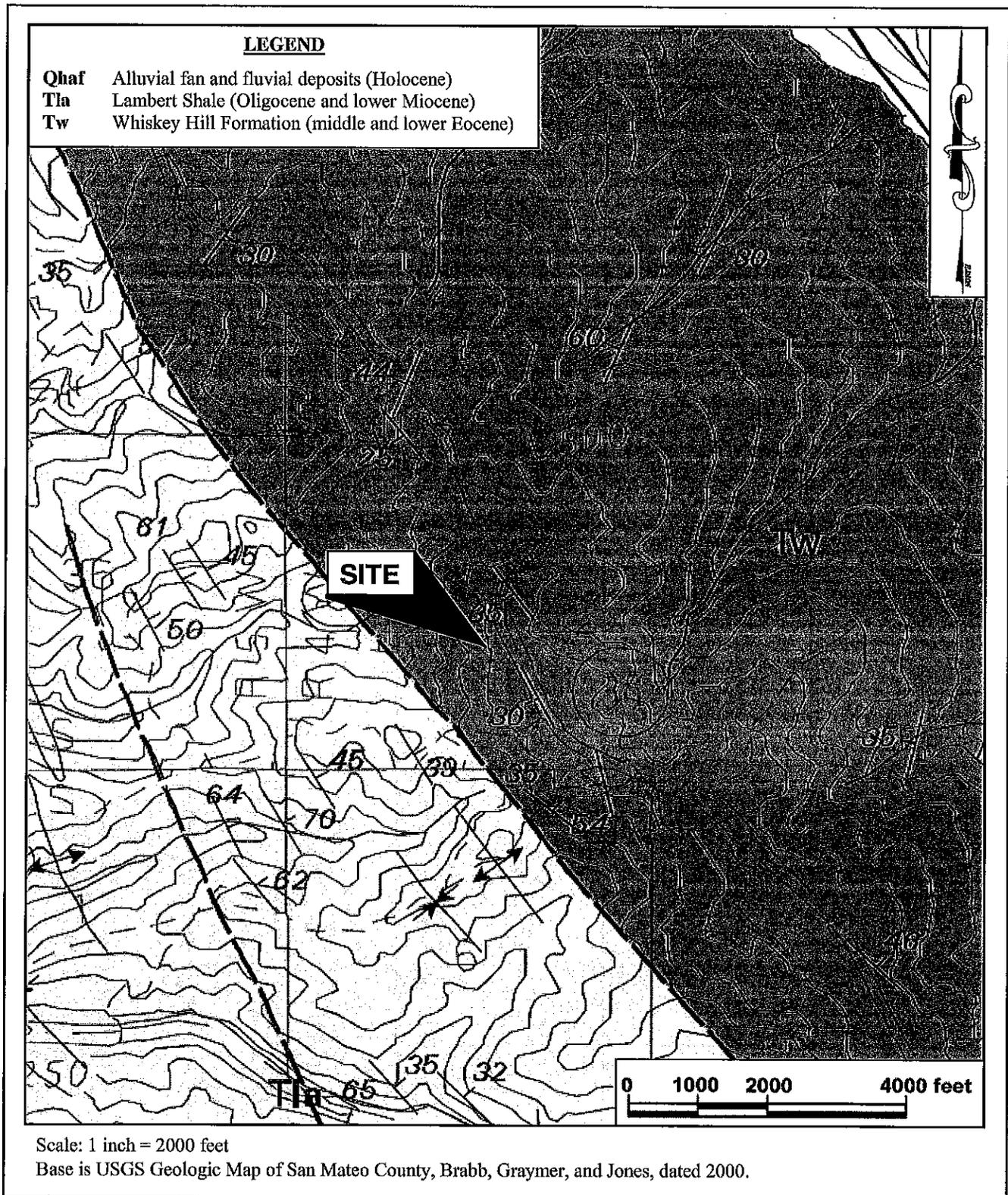


FIGURE 2
NOVEMBER 2014
PROJECT NO. 3295-1



VICINITY GEOLOGIC MAP
 STERN RESIDENCE
 WOODSIDE, CA

FIGURE 3
 NOVEMBER 2014
 PROJECT NO. 3295-1

APPENDIX A

FIELD INVESTIGATION

The soils encountered during drilling were logged by our representative and samples were obtained at depths appropriate to the investigation. The samples were taken to our laboratory where they were examined and classified in accordance with the Unified Soil Classification System. The logs of our borings, as well as a summary of the soil classification system (Figure A-1) and bedrock descriptions (Figure A-2) used on the logs, are attached.

Several tests were performed in the field during drilling. The standard penetration test resistance was determined by dropping a 140-pound hammer through a 30-inch free fall, and recording the blows required to drive the 2-inch (outside diameter) sampler 18 inches. The standard penetration test (SPT) resistance is the number of blows required to drive the sampler the last 12 inches, and is recorded on the borings log at the appropriate depth. The results of these field tests are also presented on the boring logs. Soil samples were also collected using 2.5-inch and 3-inch O.D. drive samplers. The blow counts shown on the logs for these larger diameter samplers do not represent SPT values and have not been corrected in any way.

The location and relative elevations of the borings was established by pacing using the topographic survey prepared by Lea & Braze Engineering, Inc., dated October 2, 2014, and should be considered accurate only to the degree implied by the method used.

The boring logs and related information depict our interpretation of subsurface conditions only at the specific location and time indicated. Subsurface conditions and ground water levels at other locations may differ from conditions at the locations where sampling was conducted. The passage of time may also result in changes in the subsurface conditions.



USCS SOIL CLASSIFICATION

PRIMARY DIVISIONS			SOIL TYPE	SECONDARY DIVISIONS
COARSE GRAINED SOILS (< 50 % Fines)	GRAVEL	CLEAN GRAVEL (< 5% Fines)	GW	Well graded gravel, gravel-sand mixtures, little or no fines.
		GRAVEL with FINES	GP	Poorly graded gravel or gravel-sand mixtures, little or no fines.
		GRAVEL with FINES	GM	Silty gravels, gravel-sand-silt mixtures, non-plastic fines.
	SAND	CLEAN SAND (< 5% Fines)	SW	Well graded sands, gravelly sands, little or no fines.
		SAND WITH FINES	SP	Poorly graded sands or gravelly sands, little or no fines.
		SAND WITH FINES	SM	Silty sands, sand-silt mixtures, non-plastic fines.
FINE GRAINED SOILS (> 50 % Fines)	SILT AND CLAY Liquid limit < 50%		ML	Inorganic silts and very fine sands, with slight plasticity.
	SILT AND CLAY Liquid limit < 50%		CL	Inorganic clays of low to medium plasticity, lean clays.
	SILT AND CLAY Liquid limit < 50%		OL	Organic silts and organic clays of low plasticity.
	SILT AND CLAY Liquid limit > 50%		MH	Inorganic silt, micaceous or diatomaceous fine sandy or silty soil.
	SILT AND CLAY Liquid limit > 50%		CH	Inorganic clays of high plasticity, fat clays.
	SILT AND CLAY Liquid limit > 50%		OH	Organic clays of medium to high plasticity, organic silts.
HIGHLY ORGANIC SOILS			Pt	Peat and other highly organic soils.
BEDROCK			BR	Weathered bedrock.

RELATIVE DENSITY

SAND & GRAVEL	BLOWS/FOOT*
VERY LOOSE	0 to 4
LOOSE	4 to 10
MEDIUM DENSE	10 to 30
DENSE	30 to 50
VERY DENSE	OVER 50

CONSISTENCY

SILT & CLAY	STRENGTH [^]	BLOWS/FOOT*
VERY SOFT	0 to 0.25	0 to 2
SOFT	0.25 to 0.5	2 to 4
FIRM	0.5 to 1	4 to 8
STIFF	1 to 2	8 to 16
VERY STIFF	2 to 4	16 to 32
HARD	OVER 4	OVER 32

GRAIN SIZES

BOULDERS	COBBLES	GRAVEL		SAND			SILT & CLAY
		COARSE	FINE	COARSE	MEDIUM	FINE	
12 "	3 "	0.75 "		4	10	40	200
SIEVE OPENINGS							
U.S. STANDARD SERIES SIEVE							

Classification is based on the Unified Soil Classification System; fines refer to soil passing a No. 200 sieve.

* Standard Penetration Test (SPT) resistance, using a 140 pound hammer falling 30 inches on a 2 inch O.D. split spoon sampler; blow counts not corrected for larger diameter samplers.

[^] Unconfined Compressive strength in tons/sq. ft. as estimated by SPT resistance, field and laboratory tests, and/or visual observation.

KEY TO SAMPLERS



Modified California Sampler (3-inch O.D.)

Mid-size Sampler (2.5-inch O.D.)

Standard Penetration Test Sampler (2-inch O.D.)

KEY TO EXPLORATORY BORING LOGS
STERN RESIDENCE
WOODSIDE, CA

FIGURE A-1
NOVEMBER 2014
PROJECT NO. 3295-1

WEATHERING

<p style="text-align: center;">Fresh</p> <p>Rock fresh, crystals bright, few joints may show slight staining. Rock rings under hammer if crystalline.</p> <p style="text-align: center;">Very Slight</p> <p>Rock generally fresh, joints stained, some joints may show thin clay coatings, crystals in broken face show bright. Rock rings under hammer if crystalline.</p> <p style="text-align: center;">Slight</p> <p>Rock generally fresh, joints stained, and discoloration extends into rock up to 1 inch. Joints may contain clay. In granitoid rocks some occasional feldspar crystals are dull and discolored. Crystalline rocks ring under hammer.</p> <p style="text-align: center;">Moderate</p> <p>Significant portions of rock show discoloration and weathering effects. In granitoid rocks, most feldspars are dull and discolored; some are clayey. Rock has dull sound under hammer and shows significant loss of strength as compared with fresh rock.</p>	<p style="text-align: center;">Moderately Severe</p> <p>All rock except quartz discolored or stained. In granitoid rocks, all feldspars dull and discolored and majority show kaolinization. Rock shows severe loss of strength and can be excavated with geologist's pick. Rock goes "clunk" when struck.</p> <p style="text-align: center;">Severe</p> <p>All rock except quartz discolored or stained. Rock "fabric" clear and evident, but reduced in strength to strong soil. In granitoid rocks, all feldspars kaolinized to some extent. Some fragments of strong rock usually left.</p> <p style="text-align: center;">Very Severe</p> <p>All rock except quartz discolored and stained. Rock "fabric" discernible, but mass effectively reduced to "soil" with only fragments of strong rock remaining.</p> <p style="text-align: center;">Complete</p> <p>Rock reduced to "soil". Rock fabric not discernible or discernible only in small scattered locations. Quartz may be present as dikes or stringers.</p>
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HARDNESS

<p style="text-align: center;">Very hard</p> <p>Cannot be scratched with knife or sharp pick. Hand specimens requires several hard blows of geologist's.</p> <p style="text-align: center;">Hard</p> <p>Can be scratched with knife or pick only with difficulty. Hard blow of hammer required to detach hand specimen.</p> <p style="text-align: center;">Moderately Hard</p> <p>Can be scratched with knife or pick. Gouges or grooves to 1/4 inch deep can be excavated by hard blow of point of a geologist's pick. Hard specimen can be detached by moderate blow.</p>	<p style="text-align: center;">Medium</p> <p>Can be grooved or gouged 1/16 inch deep by firm pressure on knife or pick point. Can be excavated in small chips to pieces about 1 inch maximum size by hard blows of the point of a geologist's pick.</p> <p style="text-align: center;">Soft</p> <p>Can be gouged or grooved readily with knife or pick point. Can be excavated in chips to pieces several inches in size by moderate blows of a pick point. Small thin pieces can be broken by finger pressure.</p> <p style="text-align: center;">Very Soft</p> <p>Can be carved with knife. Can be excavated readily with point of pick. Pieces 1 inch or more in thickness can be broken with finger pressure. Can be scratched readily by fingernail.</p>
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JOINT BEDDING AND FOLIATION SPACING

Spacing	Joints	Bedding and Foliation
Less than 2 in.	Very Close	Very Thin
2 in. to 1 ft.	Close	Thin
1 ft. to 3 ft.	Moderately Close	Medium
3 ft. to 10 ft.	Wide	Thick
More than 10 ft.	Very Wide	Very Thick

ROCK QUALITY DESIGNATOR (RQD)

RQD, as a percentage	Descriptor
Exceeding 90	Excellent
90 to 75	Good
75 to 50	Fair
50 to 25	Poor
Less than 25	Very Poor

KEY TO BEDROCK DESCRIPTIONS
 STERN RESIDENCE
 WOODSIDE, CA

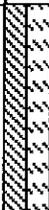
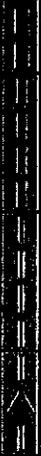
FIGURE A-2
 NOVEMBER 2014
 PROJECT NO. 3295-1

DRILL TYPE: Minuteman with 3-1/4" Continuous Flight Auger

LOGGED BY: CT

DEPTH TO GROUND WATER: Not Encountered. SURFACE ELEVATION: 499 ft

DATE DRILLED: 10/17/2014

CLASSIFICATION AND DESCRIPTION	SOIL CONSISTENCY/ DENSITY or ROCK HARDNESS* (Figure A-2)	SOIL TYPE	SOIL SYMBOL	DEPTH (FEET)	SAMPLE INTERVAL	SPT RESISTANCE (Blows/ft)		WATER CONTENT (%)	SHEAR STRENGTH (TSF)*	UNCONFIN. COMP. (TSF)*
Colluvium: Brown, Sandy Lean Clay/Silt, moist, mostly fine sand, some sandstone fragments, low plasticity.	Stiff	CL- ML		0						
Whiskey Hill Formation: Light brown, Sandstone, moist, Sandstone, fractured, manganese oxide staining, friable, severely weathered. Becomes siltstone. ▲ Free Swell = 30%.	Soft to Medium	BR								
				5						
Bottom of Boring at 9.3 feet. Note: The stratification lines represent the approximate boundary between soil and rock types, the actual transition may be gradual. *Measured using Torvane and Pocket Penetrometer devices.				10						
				15						

EXPLORATORY BORING LOG EB-1
STERN RESIDENCE
WOODSIDE, CA

BORING EB-1
NOVEMBER 2014
PROJECT NO. 3295-1

DRILL TYPE: Minuteman with 3-1/4" Continuous Flight Auger

LOGGED BY: CT

DEPTH TO GROUND WATER: Not Encountered. SURFACE ELEVATION: 477 ft

DATE DRILLED: 10/17/14

CLASSIFICATION AND DESCRIPTION	SOIL CONSISTENCY/ DENSITY or ROCK HARDNESS* (Figure A-2)	SOIL TYPE	SOIL SYMBOL	DEPTH (FEET)	SAMPLE INTERVAL	SPT RESISTANCE (Blows/ft)	WATER CONTENT (%)	SHEAR STRENGTH (TSF)*	UNCONFIN. COMP. (TSF)*
Fill: Brown, Gravelly Sand, slightly moist, fine to coarse grained sand, fine angular to rounded gravel.	Medium Dense	SW		0			3		
Colluvium: Brown, Sandy Lean Clay/Silt, moist, mostly fine sand, sandstone fragments, low plasticity.	Very Stiff	CL-ML				22	12		
Whiskey Hill Formation: Light brown, Sandstone, moist, Sandstone, fractured, manganese oxide staining, friable, severely weathered.	Soft	BR				47	12		
				5		20	9		
Becoming Siltstone, Iron oxide and manganese oxide staining.						36	17		
Some tan color seams. ▲ Free Swell = 40%.				10		27	22		
						43	19		
Bottom of Boring at 12 feet.									
Note: The stratification lines represent the approximate boundary between soil and rock types, the actual transition may be gradual.				15					
*Measured using Torvane and Pocket Penetrometer devices.									

EXPLORATORY BORING LOG EB-2
STERN RESIDENCE
WOODSIDE, CA

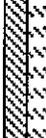
BORING EB-2
NOVEMBER 2014
PROJECT NO. 3295-1

DRILL TYPE: Minuteman with 3-1/4" Continuous Flight Auger

LOGGED BY: CT

DEPTH TO GROUND WATER: Not Encountered. SURFACE ELEVATION: 468 ft

DATE DRILLED: 10/17/2014

CLASSIFICATION AND DESCRIPTION	SOIL CONSISTENCY/ DENSITY or ROCK HARDNESS* (Figure A-2)	SOIL TYPE	SOIL SYMBOL	DEPTH (FEET)	SAMPLE INTERVAL	SPT RESISTANCE (Blows/ft)	WATER CONTENT (%)	SHEAR STRENGTH (TSF)*	UNCONFIN. COMP. (TSF)*
Fill: Brown, Sandy Lean Clay/Silt, moist, low plasticity, sandstone fragments, light orange mottling, charcoal pieces.	Stiff	CL- ML		0					
						15	14		
Colluvium: Brown, Sandy Lean Clay/Silt, moist, mostly fine sand, some sandstone fragments, low plasticity. ■ Liquid Limit = 28, Plasticity Index = 6.	Stiff	CL- ML							
						13	14		
Whiskey Hill Formation: Light brown to tan, Sandstone and Siltstone, moist, severely weathered, iron oxide and manganese oxide staining, friable, fractured. ▲ Free Swell = 50%.	Soft	BR		5					
						31	10		
						50/6"	19		
						50/5"	16		
Bottom of Boring at 8.4 feet.				10					
Note: The stratification lines represent the approximate boundary between soil and rock types, the actual transition may be gradual. *Measured using Torvane and Pocket Penetrometer devices.									
						15			

EXPLORATORY BORING LOG EB-3
STERN RESIDENCE
WOODSIDE, CA

BORING EB-3
NOVEMBER 2014
PROJECT NO. 3295-1

APPENDIX B
LABORATORY TESTS

Samples from subsurface exploration were selected for tests to help evaluate the physical and engineering properties of the soils encountered at the site. The tests that were performed are briefly described below.

The natural moisture content was determined in accordance with ASTM D2216 on nearly all of the soil samples recovered from the borings. This test determines the moisture content, representative of field conditions at the time the samples were collected. The results are presented on the boring logs at the appropriate sample depths.

The Atterberg Limits were determined on one sample of soil in accordance with ASTM D4318. The Atterberg Limits are the moisture content within which the soil is workable or plastic. The results of this test are presented in Figure B-1 and on the log of Boring EB-3 at the appropriate sample depth.

Free-swell tests were performed on three samples of siltstone bedrock encountered at the site. The results of the free-swell tests are presented on the boring logs at the appropriate sample depths.



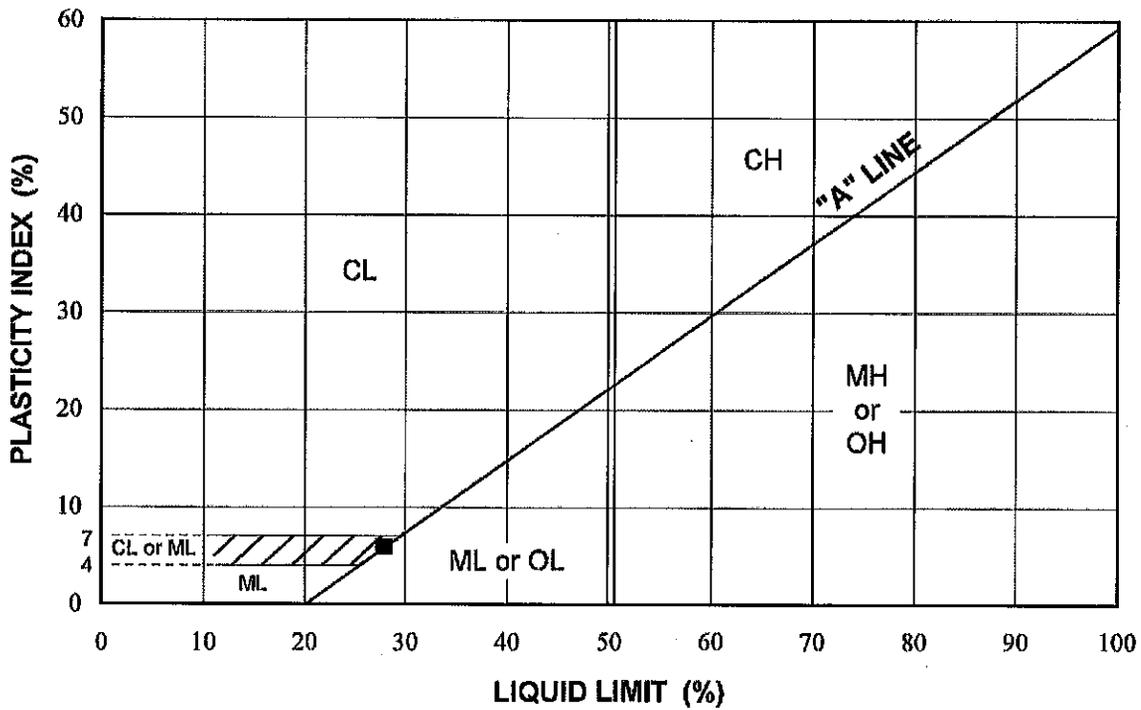


Chart Symbol	Boring Number	Sample Depth (feet)	Water Content (percent)	Liquid Limit (percent)	Plasticity Index (percent)	Liquidity Index (percent)	Passing No. 200 Sieve (percent)	USCS Soil Classification
■	EB-3	2-4	14	28	6			CL-ML

PLASTICITY CHART
 STERN RESIDENCE
 WOODSIDE, CA

FIGURE B-1
 NOVEMBER 2014
 PROJECT NO. 3295-1

COUNTY OF SAN MATEO, PLANNING AND BUILDING DEPARTMENT

**NOTICE OF INTENT TO ADOPT
NEGATIVE DECLARATION**

A notice, pursuant to the California Environmental Quality Act of 1970, as amended (Public Resources Code 21,000, et seq.), that the following project: *A Single-family Residence*, when adopted and implemented, will not have a significant impact on the environment.

FILE NO.: PLN 2015-00236

OWNER: Henry Stern

APPLICANT: Chris Parlette

ASSESSOR'S PARCEL NO.: 067-230-030

LOCATION: 13040 Skyline Boulevard, west side, approximately 550 feet north of Fisher Investments, and midway between Cypress Ridge Road and Phleger Road, in the unincorporated Woodside area of San Mateo County

PROJECT DESCRIPTION: Permit for the construction of a new 3,568 sq. ft., two-story, single-family residence, which includes an attached 743 sq. ft. two-car garage, a new septic system and leach field (to replace the existing septic system and leach field), a new underground 10,000 gallon propane tank, a new on-site guest parking, a new fire truck turnout, new retaining walls ranging from 4-8 feet in height, an outdoor patio area, and 3,381 cubic yards of grading. The existing 10,000 gallon water tank and the existing domestic well will remain on-site and will be utilized by the new residence. Pre-construction surveys for special status species/habitat are included in the proposal. Eight trees are proposed for removal. The project site is located within the Skyline Boulevard State Scenic Corridor. Access to the residence will be by an existing driveway off of Skyline Boulevard. The project involves approximately 1,870 cubic yards of excavation and 1,511 cubic yards of fill.

FINDINGS AND BASIS FOR A NEGATIVE DECLARATION

The Current Planning Section has reviewed the initial study for the project and, based upon substantial evidence in the record, finds that:

1. The project will not adversely affect water or air quality or increase noise levels substantially.
2. The project will not have adverse impacts on the flora or fauna of the area.
3. The project will not degrade the aesthetic quality of the area.
4. The project will not have adverse impacts on traffic or land use.
5. In addition, the project will not:

- a. Create impacts which have the potential to degrade the quality of the environment.
- b. Create impacts which achieve short-term to the disadvantage of long-term environmental goals.
- c. Create impacts for a project which are individually limited, but cumulatively considerable.
- d. Create environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly.

The County of San Mateo has, therefore, determined that the environmental impact of the project is insignificant, as mitigated.

MITIGATION MEASURES included in the project to avoid potentially significant effects:

Mitigation Measure 1: Prior to any grading activities, the following minimum dust control measures shall be implemented and maintained throughout the duration of the project:

- a. Water all active construction and grading areas at least twice daily.
- b. Cover all truck hauling soil, sand, and other loose materials or require all trucks to maintain at least 2 feet of freeboard.
- c. Apply water two times daily, or apply (non-toxic) soil stabilizers on all unpaved access roads, parking areas and staging areas at the project site.
- d. Enclose, cover, water twice daily or apply (non-toxic) soil binders to exposed stockpiles (dirt, sand, etc.).

Mitigation Measure 2: Vegetation removal shall be scheduled to occur between August 1 and March 1 of any given year, which is outside the bird nesting season. If this is not possible, the applicant shall hire a qualified biologist to conduct preconstruction nesting bird surveys no more than 2 weeks prior to vegetation disturbance or removal. If nesting birds are present and may be impacted by the vegetation removal, the biologist shall designate a buffer zone around the nest (e.g., 50 feet for passerines and 200 feet for raptors) where no vegetation removal will take place until the biologist has confirmed that all young have fledged the nest.

Mitigation Measure 3: If during the construction phase any archaeological or historical evidence is uncovered or encountered during construction, the project has been conditioned to halt all excavations of the site within 30 feet and retain an historian/archaeologist to investigate the findings. In addition, the Current Planning Section shall be notified of such findings, and no additional work shall be done on-site, until the historian/archaeologist has recommended appropriate mitigation measures, and those measures have been approved by the Current Planning Section.

Mitigation Measure 4: If during any site activities associated with the project any paleontological resource is discovered, all work within 30 feet shall be halted long enough to call in a qualified paleontologist to assess the find and propose appropriate mitigation measures. In addition, the Current Planning Section shall be notified of such findings, and no additional work shall be done until the paleontologist has recommended appropriate measures, and those measures have been approved by the Current Planning Section and implemented.

Mitigation Measure 5: The property owner, applicant, and contractors must be prepared to carry out the requirements of California State Law with regard to the discovery of human remains during construction, whether historic or prehistoric. In the event that any human remains are encountered during site disturbance, all ground-disturbing work shall cease immediately and the County coroner shall be notified immediately. If the coroner determines the remains to be Native American, the Native American Heritage Commission shall be contacted within 24 hours. A qualified archaeologist, in consultation with the Native American Heritage Commission, shall recommend subsequent measures for disposition of the remains.

Mitigation Measure 6: Prior to any land disturbance and throughout the grading operation, the approved erosion control plan, as prepared and signed by the engineer of record, shall be implemented. Prior to issuance of the grading permit “hard card,” the applicant shall submit revised erosion control plan sheets that include the following addition measures for review and approval:

- a. Show the location(s) for storage of construction material, construction equipment, and parking of construction vehicles on the erosion control plan (Sheet C304), as described in Section III (Management Practices Employed to Minimize Contact of Construction Materials, Equipment, and Vehicles with Stormwater) of the Erosion Control Notes and Details plan sheet.
- b. Provide a detail for the proposed silt fencing and protection for stockpiled materials (such as anchored down plastic sheeting in dry weather), as described in Section IV (Construction Material Loading, Unloading, and Access Areas) of the Erosion Control Notes and Details plan (sheet C305).
- c. Show the location(s) of construction staging area(s) on the erosion control plan (Sheet C304), as described in Section IV (Construction Material Loading, Unloading, and Access Areas) of the Erosion Control Notes and Details plan sheet.
- d. Note on the tree protection detail of the Erosion Control Notes and Details plan (Sheet C305) that tree protection shall consist of orange plastic fencing at the driplines where feasible.
- e. Provide a detail for the proposed “Limit of Construction” barrier/fencing (such as orange plastic fencing, chain link fencing, or other barrier measure) on the Erosion Control Notes and Details plan (Sheet C305).
- f. Show the location(s) of any office trailer(s), storage sheds, and/or other temporary installations on the erosion control plan (as applicable). As necessary, show how these temporary structures will be accessed and protection for any access routes.

Mitigation Measure 7: No grading shall be allowed during the winter season (October 1 – April 30) or during any rain event to avoid potential increased soil erosion unless prior written request by the applicant is made to the Community Development Director and approval is granted by the Community Development Director. A grading permit “hard card” is required prior to the start of any land disturbance/grading operation. The applicant shall submit a letter to the Current Planning Section, at least two (2) weeks prior to the commencement of grading, stating the date when grading operation will begin, anticipated end date of grading operation, including dates of revegetation, and estimated date of establishment of newly planted vegetation.

Mitigation Measure 8: The property owner, or designee, shall adhere to the San Mateo Countywide Stormwater Pollution Prevention Program “General Construction and Site Supervision Guidelines,” including, but not limited to, the following:

- a. Delineation with field markers of clearing limits, easements, setbacks, sensitive or critical areas, buffer zones, trees, and drainage courses within the vicinity of areas to be disturbed by construction and/or grading.
- b. Protection of adjacent properties and undisturbed areas from construction impacts using vegetative buffer strips, sediment barriers or filters, dikes, mulching, or other measures as appropriate.
- c. Performing clearing and earthmoving activities only during dry weather.
- d. Stabilization of all denuded areas and maintenance of erosion control measures continuously between October 1 and April 30.
- e. Storage, handling, and disposal of construction materials and wastes properly, so as to prevent their contact with stormwater.
- f. Control and prevention of the discharge of all potential pollutants, including pavement cutting wastes, paints, concrete, petroleum products, chemicals, wash water or sediments, and non-stormwater discharges to storm drains and watercourses.
- g. Use of sediment controls or filtration to remove sediment when dewatering site and obtain all necessary permits.
- h. Avoiding cleaning, fueling, or maintaining vehicles on-site, except in a designated area where wash water is contained and treated.
- i. Limiting and timing application of pesticides and fertilizers to prevent polluted runoff.
- j. Limiting construction access routes and stabilization of designated access points.
- k. Avoiding tracking dirt or other materials off-site; cleaning off-site paved areas and sidewalks using dry sweeping methods.
- l. Training and providing instruction to all employees and subcontractors regarding the Watershed Protection Maintenance Standards and construction Best Management Practices.
- m. Additional Best Management Practices in addition to those shown on the plans may be required by the Building Inspector to maintain effective stormwater management during construction activities. Any water leaving the site shall be clear and running slowly at all times.
- n. Failure to install or maintain these measures will result in stoppage of construction until the corrections have been made and fees paid for staff enforcement time.

Mitigation Measure 9: For final approval of the grading permit, the property owner, or designee, shall ensure performance of the following activities within thirty (30) days of grading completion at the project site:

- a. The project engineer shall submit written certification that all grading has been completed in conformance with the approved plans, conditions of approval/mitigation measures, and the County Grading Regulations, to the Department of Public Works and the Planning and Building Department's Geotechnical Section.
- b. The geotechnical consultant shall observe and approve all applicable work during construction, sign Section II of the Geotechnical Consultant Approval form, and submit the signed form to the Planning and Building Department's Geotechnical Section and Current Planning Section.

Mitigation Measure 10: The applicant shall implement the following basic construction measures at all times:

- a. 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 Toxic Control Measure Title 13, Section 2485 of California Code of Regulations [CCR]). Clear signage shall be provided for construction workers at all access points.
- b. All construction equipment shall be maintained and properly tuned in accordance with manufacturer's specifications. All equipment shall be checked by a certified visible emissions evaluator.
- c. Post a publicly visible sign with the telephone number and person to contact at the lead agency regarding dust complaints. This person, or his/her designee, 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

RESPONSIBLE AGENCY CONSULTATION: None.

INITIAL STUDY: The San Mateo County Current Planning Section has reviewed the Environmental Evaluation of this project and has found that the probable environmental impacts are insignificant, as mitigated. A copy of the initial study is attached.

REVIEW PERIOD: December 30, 2015 to January 19, 2016

All comments regarding the correctness, completeness, or adequacy of this Negative Declaration must be received by the County Planning and Building Department, 455 County Center, Second Floor, Redwood City, no later than **5:00 p.m., January 19, 2016.**

CONTACT PERSON

Olivia Boo, Project Planner
650/363-1818; oboo@smcgov.org



Olivia Boo, Project Planner

OB:jlh/pac – OSBZ0881_JLH.DOCX

County of San Mateo
Planning and Building Department

**INITIAL STUDY
ENVIRONMENTAL EVALUATION CHECKLIST**
(To Be Completed by Planning Department)

1. **Project Title:** Single-Family Residence
2. **County File Number:** PLN 2015-00236
3. **Lead Agency Name and Address:** County of San Mateo, Planning and Building Department, 455 County Center, 2nd Floor, Redwood City, CA 94063
4. **Contact Person and Phone Number:** Olivia Boo, Project Planner, 650/363-1818
5. **Project Location:** Skyline Boulevard, west side, approximately 550 feet north of Fisher Investments, and midway between Cypress Ridge Road and Phleger Road, in unincorporated Woodside area of San Mateo County
6. **Assessor's Parcel Number and Size of Parcel:** 067-230-030; 2.50 Acres (108,902 sq. ft.)
7. **Project Sponsor's Name and Address:** Henry Stern, 13040 Skyline Boulevard, Woodside, CA 94062
8. **General Plan Designation:** Open Space
9. **Zoning:** RM (Resource Management District)
10. **Description of the Project:** Permit for the construction of a new 3,568 sq. ft., two-story, single-family residence, which includes an attached 743 sq. ft. two-car garage, a new septic system and leach field (to replace the existing septic system and leach field), a new underground 10,000 gallon propane tank, a new on-site guest parking, a new fire truck turnout, new retaining walls ranging from 4-8 feet in height, an outdoor patio area, and 3,381 cubic yards of grading. The existing 10,000 gallon water tank and the existing domestic well will remain on-site and will be utilized by the new residence. Pre-construction surveys for special status species/habitat are included in the proposal. Eight trees are proposed for removal. The project site is located within the Skyline Boulevard State Scenic Corridor. Access to the residence will be by an existing driveway off of Skyline Boulevard. The project involves approximately 1,870 cubic yards of excavation and 1,511 cubic yards of fill.
11. **Surrounding Land Uses and Setting:** The parcel is developed with an existing 1,500 sq. ft. home and is heavily vegetated with existing low growing vegetation and mature trees. The parcel is located on the west side of Skyline Boulevard and accessed by an existing paved driveway directly from Skyline Boulevard. The parcel has a slope of approximately 30% for the first 100 feet and then continues downward with a steep 50% slope. The surrounding area is rural with scattered residential development.
12. **Other Public Agencies Whose Approval is Required:** The California Department of Transportation (CalTrans)

ENVIRONMENTAL FACTORS POTENTIALLY AFFECTED

The environmental factors checked below would be potentially affected by this project, involving at least one impact that is a “Potentially Significant Impact” as indicated by the checklist on the following pages.

	Aesthetics	X	Climate Change		Population/Housing
	Agricultural and Forest Resources	X	Hazards and Hazardous Materials		Public Services
X	Air Quality	X	Hydrology/Water Quality		Recreation
X	Biological Resources	X	Land Use/Planning		Transportation/Traffic
X	Cultural Resources		Mineral Resources		Utilities/Service Systems
X	Geology/Soils		Noise		Mandatory Findings of Significance

EVALUATION OF ENVIRONMENTAL IMPACTS

1. A brief explanation is required for all answers except “No Impact” answers that are adequately supported by the information sources a lead agency cites. A “No Impact” answer is adequately supported if the referenced information sources show that the impact simply does not apply to projects like the one involved (e.g., the project falls outside a fault rupture zone). A “No Impact” answer should be explained where it is based on project-specific factors as well as general standards (e.g., the project will not expose sensitive receptors to pollutants, based on a project-specific screening analysis).
2. All answers must take account of the whole action involved, including off-site as well as on-site, cumulative as well as project-level, indirect as well as direct, and construction as well as operational impacts.
3. Once the lead agency has determined that a particular physical impact may occur, then the checklist answers must indicate whether the impact is potentially significant, less than significant with mitigation, or less than significant. “Potentially Significant Impact” is appropriate if there is substantial evidence that an effect may be significant. If there are one or more “Potentially Significant Impact” entries when the determination is made, an EIR is required.
4. “Negative Declaration: Less Than Significant with Mitigation Incorporated” applies where the incorporation of mitigation measures has reduced an effect from “Potentially Significant Impact” to a “Less Than Significant Impact.” The lead agency must describe the mitigation measures, and briefly explain how they reduce the effect to a less than significant level (mitigation measures from “Earlier Analyses,” as described in 5. below, may be cross-referenced).
5. Earlier analyses may be used where, pursuant to the tiering, program EIR, or other CEQA process, an effect has been adequately analyzed in an earlier EIR or negative declaration (Section 15063(c)(3)(D)). In this case, a brief discussion should identify the following:
 - a. Earlier Analysis Used. Identify and state where they are available for review.

- b. Impacts Adequately Addressed. Identify which effects from the above checklist were within the scope of and adequately analyzed in an earlier document pursuant to applicable legal standards, and state whether such effects were addressed by mitigation measures based on the earlier analysis.
 - c. Mitigation Measures. For effects that are “Less Than Significant with Mitigation Measures Incorporated,” describe the mitigation measures which were incorporated or refined from the earlier document and the extent to which they address site-specific conditions for the project.
6. Lead agencies are encouraged to incorporate into the checklist references to information sources for potential impacts (e.g., general plans, zoning ordinances). Reference to a previously prepared or outside document should, where appropriate, include a reference to the page or pages where the statement is substantiated.
7. Supporting Information Sources. Sources used or individuals contacted should be cited in the discussion.

1. AESTHETICS. Would the project:				
	<i>Potentially Significant Impacts</i>	<i>Significant Unless Mitigated</i>	<i>Less Than Significant Impact</i>	<i>No Impact</i>
1.a. Have a significant adverse effect on a scenic vista, views from existing residential areas, public lands, water bodies, or roads?			X	
<p>Discussion: The project site is located within the Skyline Boulevard State Scenic Corridor. The first half of the parcel has a gradual 30% downslope to the west. This area includes the driveway and the majority of the new residence. The rear half of the parcel has a 50% downslope continuing to the west. The existing 1,500 sq. ft. single-family residence will be demolished and replaced with a 3,568 sq. ft. two-story residence, an attached two-car garage, on-site parking, one replacement septic system and leach field, and a new 10,000 gallon subgrade propane tank. The existing 10,000 gallon water tank and domestic well will remain. Although eight trees are proposed for removal, the subject parcel is located within extremely dense vegetation, with much of the vegetation between Skyline Boulevard and the proposed residence to remain in place. The eight trees require removal as they are located within the construction footprint of the new residence. The property is well screened by vegetation and the location of the residence is downslope of Skyline Boulevard, therefore, none of the proposed development will be visible from Skyline Boulevard. The proposed residence will also utilize colors and materials that blend with the surrounding environment to lessen potential impacts.</p> <p>Source: Field Inspection, County General Plan, Scenic Corridor Map, Google Earth/Maps, Project Plans.</p>				

1.b. Significantly damage or destroy scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway?			X	
<p>Discussion: The proposed project will not significantly damage or destroy scenic resources given the dense vegetation and mature trees which provide screening from Skyline Boulevard. Eight trees are proposed for removal in the front yard area, however, the removal will not make the development more visible from Skyline Boulevard. The project does not involve rock outcropping or historic buildings.</p> <p>Source: Field Inspection, Project Plans.</p>				
1.c. Significantly degrade the existing visual character or quality of the site and its surroundings, including significant change in topography or ground surface relief features, and/or development on a ridgeline?			X	
<p>Discussion: The project proposes 1,870 cubic yards of cut and 1,511 cubic yards of fill. The new residence is proposed in the same location as the existing 1,500 sq. ft. residence. Grading for this project will alter portions of the front half of the parcel to accommodate a new driveway and a 1,600 sq. ft. parking area on the left side of the proposed residence, as well as a fire access driveway adjacent to the northern property line. In areas where the new residence extends beyond the existing residence footprint, grading will also occur.</p> <p>Three patio areas totaling 4,500 sq. ft. (2,800 sq. ft., 1,000 sq. ft., and 700 sq. ft.) will be created all leading from the new residence. Additionally, the area beyond the proposed residential footprint will be altered to accommodate for drainage and leach field purposes.</p> <p>The project will alter the front half of the property, though this alteration will not be visible from Skyline Boulevard.</p> <p>Source: Field Inspection, Proposed Site Plans.</p>				
1.d. Create a new source of significant light or glare that would adversely affect day or nighttime views in the area?			X	
<p>Discussion: The project will be conditioned to be designed in a manner that will be minimally intrusive to the surrounding area, including the avoidance of introducing any significant sources of exterior light pollution to the area by implementing light fixtures that direct light downwards toward the ground.</p> <p>Source: Project Plans.</p>				
1.e. Be adjacent to a designated Scenic Highway or within a State or County Scenic Corridor?			X	
<p>Discussion: Yes, see Section 1.a.</p> <p>Source: Field Inspection, Project Plans, San Mateo County Geographic Information System.</p>				

1.f.	If within a Design Review District, conflict with applicable General Plan or Zoning Ordinance provisions?				X
<p>Discussion: The project is not located within a Design Review District.</p> <p>Source: Zoning Maps, General Plan.</p>					
1.g.	Visually intrude into an area having natural scenic qualities?			X	
<p>Discussion: See staff's response to Section 1.a.</p> <p>Source: Google Maps, Field Inspection, Project Plans.</p>					

<p>2. AGRICULTURAL AND FOREST RESOURCES. In determining whether impacts to agricultural resources are significant environmental effects, lead agencies may refer to the California Agricultural Land Evaluation and Site Assessment Model (1997) prepared by the California Department of Conservation as an optional model to use in assessing impacts on agriculture and farmland. In determining whether impacts to forest resources, including timberland, are significant environmental effects, lead agencies may refer to information compiled by the California Department of Forestry and Fire Protection regarding the State's inventory of forestland, including the Forest and Range Assessment Project and the Forest Legacy Assessment Project; and forest carbon measurement methodology provided in Forest Protocols adopted by the California Air Resources Board. Would the project:</p>					
		<i>Potentially Significant Impacts</i>	<i>Significant Unless Mitigated</i>	<i>Less Than Significant Impact</i>	<i>No Impact</i>
2.a.	For lands outside the Coastal Zone, convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland) as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use?				X
<p>Discussion: The State's Important Farmland 2012 map for San Mateo County shows that the parcel consists of Urban and Built-Up Lands. Urban and Built-Up Lands are lands occupied by structures with a building density of at least one unit to 1.5 acres and are used for residential, industrial, commercial, and other developed purposes. Urban and Built-Up Lands are not classified as Prime, Unique, or Farmlands of Statewide Importance.</p> <p>Source: Geographic Information System, County Important Farmland Map.</p>					
2.b.	Conflict with existing zoning for agricultural use, an existing Open Space Easement, or a Williamson Act contract?				X

<p>Discussion: The property is not located within an open space easement or under a Williamson Act contract, but it is land designated by the County's General Land Use map as Open Space. The subject parcel is zoned Resource Management District which is not an agricultural zoning district, though it does allow for agricultural uses. Although this zoning designation promotes open space, residential use is permitted upon approval of a Resource Management District (RM). All of the aspects of the proposal are permitted in the Resource Management District upon issuance of an RM Permit.</p> <p>Source: Geographic Information System.</p>					
2.c.	Involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland to non-agricultural use or conversion of forestland to non-forest use?				X
<p>Discussion: See staff's response to Section 2.a. for the discussion on Farmland. According to Public Resources Code Section 12220 (g), forestland is defined as land that supports 10 percent native tree cover of any species, including hardwoods, under natural conditions, and allows for management of one or more forest resources, including timber, aesthetics, fish and wildlife, biodiversity, water quality, recreation, and other public benefits. The area in which the project is proposed is already disturbed (e.g., existing house site) and is heavily vegetated with trees, therefore, there is no new conversion.</p> <p>Source: Public Resources Code Section 12220(g).</p>					
2.d.	For lands within the Coastal Zone, convert or divide lands identified as Class I or Class II Agriculture Soils and Class III Soils rated good or very good for artichokes or Brussels sprouts?				X
<p>Discussion: The parcel is not located within the Coastal Zone.</p> <p>Source: Geographic Information System (GIS).</p>					
2.e.	Result in damage to soil capability or loss of agricultural land?				X
<p>Discussion: The project site will not result in damage to soil capability or loss of agricultural land since the existing house site will be used for the new residence and the area is heavily forested.</p> <p>Source: Geographic Information System (GIS).</p>					
2.f.	Conflict with existing zoning for, or cause rezoning of, forestland (as defined in Public Resources Code Section 12220(g)), timberland (as defined by Public Resources Code Section 4526), or timberland zoned Timberland Production (as defined by Government Code Section 51104(g))?				X

<p><i>Note to reader: This question seeks to address the economic impact of converting forestland to a non-timber harvesting use.</i></p>				
<p>Discussion: Although the land qualifies as forestland, no rezoning is proposed and the land has not been harvested and does not meet the definition of timberland and is not a Timberland Preserve Zone (TPZ). The project parcel is zoned RM (Resource Management). The proposed project will not constitute a land conversion and will not conflict with any existing zoning, as the proposed use is allowed in the RM Zoning District subject to approval of an RM Permit.</p> <p>Source: County Zoning Map and Regulations.</p>				

<p>3. AIR QUALITY. Where available, the significance criteria established by the applicable air quality management or air pollution control district may be relied upon to make the following determinations. Would the project:</p>				
	Potentially Significant Impacts	Significant Unless Mitigated	Less Than Significant Impact	No Impact
<p>3.a. Conflict with or obstruct implementation of the applicable air quality plan?</p>			X	
<p>Discussion: Although the project involves earthwork for the construction of a single-family residence, replacement septic system and leach field, new propane tank, and new fire truck turnaround, the Bay Area Air Quality Management District (BAAQMD) does not find that one single-family residence meets or exceeds the threshold of significance for project or cumulative impacts since the project conforms with the current General Plan.</p> <p>Source: Bay Area Air Quality Management District, Regulation 2, Rule 1 (2-1-113). BAAQMD California Environmental Quality Act Thresholds of Significance.</p>				
<p>3.b. Violate any air quality standard or contribute significantly to an existing or projected air quality violation?</p>				X
<p>Discussion: See Section 3.a.</p> <p>Source: Bay Area Air Quality Management District.</p>				
<p>3.c. Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable Federal or State ambient air quality standard (including releasing emissions which exceed quantitative thresholds for ozone precursors)?</p>			X	

Discussion: The San Francisco Bay Area Basin is a non-attainment area for ozone and particulate matter. However, it is unlikely that, given the scope of the project, this proposal would result in a considerable net increase in criteria pollutants (e.g., ozone, particulate matter).

Source: Bay Area Air Quality Management District.

3.d. Expose sensitive receptors to significant pollutant concentrations, as defined by BAAQMD?				X
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Discussion: Sensitive receptors are facilities or land uses, such as schools, hospitals, or residential areas where people live, play, or convalesce, a place where sensitive individuals spend significant amounts of time. Sensitive individuals are those most susceptible to poor air quality: children, elderly, and those with pre-existing health problems. There are no known sensitive receptors within the area.

The project will result in short-term, grading-related emissions and dust associated with the construction of the residence. However, it is unlikely that the project will generate significant pollutant concentrations, as defined by BAAQMD. Additionally, the site is in a fairly remote rural location with no known sensitive receptors located within the nearby project vicinity. Furthermore, the surrounding tree canopy and vegetation help to insulate the project area.

Source: BAAQMD 5.2.5, Page 5-8 (2011), Google Maps.

3.e. Create objectionable odors affecting a significant number of people?			X	
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Discussion: None proposed. Odors during the construction phase may result, however, these will be limited to the duration of construction.

Source: San Mateo County Geographic System, BAAQMD.

3.f. Generate pollutants (hydrocarbon, thermal odor, dust or smoke particulates, radiation, etc.) that will violate existing standards of air quality on-site or in the surrounding area?		X		
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Discussion: The project will result in short-term, grading-related emissions, and dust associated with the construction of the residence. While the site is in a fairly remote rural location, the property is surrounded by tree canopy and vegetation that will help to insulate the grading and construction-related pollutants (i.e., dust). To ensure that dust particulates generated by the project are minimized, the following mitigation measure is recommended:

Mitigation Measure 1: Prior to any grading activities, the following minimum dust control measures shall be implemented and maintained throughout the duration of the project:

- a. Water all active construction and grading areas at least twice daily.
- b. Cover all truck hauling soil, sand, and other loose materials or require all trucks to maintain at least 2 feet of freeboard.
- c. Apply water two times daily, or apply (non-toxic) soil stabilizers on all unpaved access roads, parking areas and staging areas at the project site.

d. Enclose, cover, water twice daily or apply (non-toxic) soil binders to exposed stockpiles (dirt, sand, etc.).

Source: BAAQMD, Project Plans.

4. BIOLOGICAL RESOURCES. Would the project:

	<i>Potentially Significant Impacts</i>	<i>Significant Unless Mitigated</i>	<i>Less Than Significant Impact</i>	<i>No Impact</i>
4.a. Have a significant adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?		X		

Discussion: According to the California Natural Diversity Database (CNDDDB), there is suspected evidence of Kings Mountain manzanita in the vicinity though this species is not protected at either the Federal or State level. Staff requested a biologist report which was, prepared by Biotic Resources Group, and confirms no Kings Mountain manzanita was found on the subject property.

According to the submitted biologist report, the project site was not observed to support any special status trees or shrubs. Due to the lack of specialized microhabitats (i.e., lack of serpentine, rocky outcrops, and native grassland), it was determined that the site has a low likelihood of supporting special status herbaceous species. No special plant species were observed, or are expected to occur, on the property.

The biologist report also evaluated the potential for special status wildlife species in the project area as described. No special status wildlife are known from the project area and none are expected based on the habitats present.

Removal of vegetation for the proposed residential development may impact nesting birds if nesting birds are present at the time of tree removal or limbing. Nesting birds are protected under the Migratory Bird Treaty Act and the following mitigation is identified to avoid potential impacts.

Mitigation Measure 2: Vegetation removal shall be scheduled to occur between August 1 and March 1 of any given year, which is outside the bird nesting season. If this is not possible, the applicant shall hire a qualified biologist to conduct preconstruction nesting bird surveys no more than 2 weeks prior to vegetation disturbance or removal. If nesting birds are present and may be impacted by the vegetation removal, the biologist shall designate a buffer zone around the nest (e.g., 50 feet for passerines and 200 feet for raptors) where no vegetation removal will take place until the biologist has confirmed that all young have fledged the nest.

Source: Submitted Biotic Resources Group Biologist Project Report.

4.b. Have a significant adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, and regulations or by the				X
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California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?				
<p>Discussion: No riparian habit is present on the parcel, see Section 4.a.</p> <p>Source: Submitted Biotic Resources Group Biologist Project Report.</p>				
4.c. Have a significant adverse effect on federally protected wetlands as defined by Section 404 of the Clean Water Act (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means?				X
<p>Discussion: The site does not support any wetlands.</p> <p>Source: Submitted Biotic Resources Group Biologist Project Report.</p>				
4.d. Interfere significantly with the movement of any native resident or migratory fish or wildlife species or with established native resident migratory wildlife corridors, or impede the use of native wildlife nursery sites?				X
<p>Discussion: See Section 4.a.</p> <p>Source: Geographic Information System, Submitted Biotic Resources Group Biologist Project Report.</p>				
4.e. Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance (including the County Heritage and Significant Tree Ordinances)?			X	
<p>Discussion: The project includes removal of eight trees. Per the County's Significant and Heritage Tree Removal Ordinances, the project requires replacement tree plantings to occur at a 1:1 ratio, and a minimum size 15-gallon size trees to be installed prior to the construction finalization.</p> <p>Source: Project Plans, Zoning Ordinance.</p>				
4.f. Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Conservation Community Plan, other approved local, regional, or State habitat conservation plan?				X
<p>Discussion: The project site is not located within an area subject to a Habitat Conservation Plan or Natural Conservation Community Plan.</p>				

Source: Google Maps, General Plan. Submitted Biotic Resources Group Biologist report.					
4.g.	Be located inside or within 200 feet of a marine or wildlife reserve?				X
Discussion: The project site is not located inside or within 200 feet of a marine or wildlife reserve. Source: Geographic Information System, Submitted Biotic Resources Group Biologist Report.					
4.h.	Result in loss of oak woodlands or other non-timber woodlands?				X
Discussion: See Section 4.e. Source: Project Plans.					

5. CULTURAL RESOURCES. Would the project:					
		<i>Potentially Significant Impacts</i>	<i>Significant Unless Mitigated</i>	<i>Less Than Significant Impact</i>	<i>No Impact</i>
5.a.	Cause a significant adverse change in the significance of a historical resource as defined in CEQA Section 15064.5?			X	
Discussion: No, the project site does not contain a historical resource; the existing home was built in the 1960s and is not likely to be historical or eligible to be listed on the national or local register. Source: California Historical Resources List.					
5.b.	Cause a significant adverse change in the significance of an archaeological resource pursuant to CEQA Section 15064.5?		X		
Discussion: Archaeological resources means any material remains of human life or activities which are at least 100 years of age and which are of archaeological interest. These items include but are not limited to: pottery, basketry, bottles, weapons, weapon projectiles, tools, structures or portions of structures, pit houses, rock paintings, rock carvings, intaglios, graves, human skeletal materials, or any portion or piece of any of the foregoing items. The project is not expected to cause an adverse impact to any archaeological resource; however, the following mitigation measure is recommended since the location of the new residence will extend beyond the existing house footprint, thereby disturbing new undeveloped areas. Due to earthwork associated with the project construction, the project may have the potential to impact any unknown archaeological resources. Therefore, Mitigation Measure 3 is recommended to minimize any potential unearthing and impact to any unknown archaeological resource within the project area during proposed earthwork activities: Mitigation Measure 3: If during the construction phase any archaeological or historical evidence is uncovered or encountered during construction, the project has been conditioned to halt all excavations of the site within 30 feet and retain an historian/archaeologist to investigate the findings. In					

addition, the Current Planning Section shall be notified of such findings, and no additional work shall be done on-site, until the historian/archaeologist has recommended appropriate mitigation measures, and those measures have been approved by the Current Planning Section.

Source: Federal Historic Preservation Laws (Archaeological Resources, Protection Act, Section 3, 16 U.S.C. 4700BB, page 141), Project Plans.

5.c. Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?		X		
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Discussion: Paleontological resources are any fossilized remains, traces or imprints of organisms, preserved in or on the earth's crust, that are of paleontological interest and that provide information about the history of life on earth. The project area consists of already disturbed land and is being clustered on and near the existing developed areas. Nonetheless, due to the earthwork associated with the project construction, the project may have the potential to impact any unknown paleontological resources. Therefore, the following mitigation measure is recommended to minimize any potential unearthing and impact to any unknown paleontological resource within the project area during proposed earthwork activities:

Mitigation Measure 4: If during any site activities associated with the project any paleontological resource is discovered, all work within 30 feet shall be halted long enough to call in a qualified paleontologist to assess the find and propose appropriate mitigation measures. In addition, the Current Planning Section shall be notified of such findings, and no additional work shall be done until the paleontologist has recommended appropriate measures, and those measures have been approved by the Current Planning Section and implemented.

Source: Paleontological Resources Preservation Act (Section 6301. Definitions (4), Project Plans.

5.d. Disturb any human remains, including those interred outside of formal cemeteries?		X		
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Discussion: The project area consists of already disturbed land and is being clustered near existing developed areas. Nonetheless, due to the earthwork associated with the project construction, the project may have the potential to disturb any interred human remains, including those interred outside of formal cemeteries. Therefore, the following mitigation measure is recommended to minimize any potential unearthing and impact to any unknown human remains within the project area during proposed earthwork activities:

Mitigation Measure 5: The property owner, applicant, and contractors must be prepared to carry out the requirements of California State Law with regard to the discovery of human remains during construction, whether historic or prehistoric. In the event that any human remains are encountered during site disturbance, all ground-disturbing work shall cease immediately and the County coroner shall be notified immediately. If the coroner determines the remains to be Native American, the Native American Heritage Commission shall be contacted within 24 hours. A qualified archaeologist, in consultation with the Native American Heritage Commission, shall recommend subsequent measures for disposition of the remains.

Source: Project Plans

6. GEOLOGY AND SOILS. Would the project:				
	<i>Potentially Significant Impacts</i>	<i>Significant Unless Mitigated</i>	<i>Less Than Significant Impact</i>	<i>No Impact</i>
6.a. Expose people or structures to potential significant adverse effects, including the risk of loss, injury, or death involving the following, or create a situation that results in:				
i. Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other significant evidence of a known fault? <i>Note: Refer to Division of Mines and Geology Special Publication 42 and the County Geotechnical Hazards Synthesis Map.</i>				X
<p>Discussion: The project site is not located within the Alquist-Priolo Fault Zone. The Geotechnical Section has given preliminary approval of the project. Construction is required to meet building code seismic criteria.</p> <p>Source: San Mateo County Hazard Mapped Resources, Geotechnical Review.</p>				
ii. Strong seismic ground shaking?			X	
<p>Discussion:</p> <p>The San Mateo County Hazard Map notes the site is located less than 2 miles from the San Andreas fault and would be expected to experience some shaking. Construction is required to meet building code seismic criteria.</p> <p>Source: San Mateo County Hazard Mapped Resources.</p>				
iii. Seismic-related ground failure, including liquefaction and differential settling?			X	
<p>Discussion: The Association of Bay Area Governments Earthquake Liquefaction and Shaking Map indicates the parcel is in a Very Strong area. Residential construction will be reviewed by the Geotechnical Section and must meet seismic criteria as well as address liquefaction.</p> <p>Source: Association of Bay Area Governments.</p>				
iv. Landslides?			X	

Discussion: According to the San Mateo County Landslide Susceptibility Map, the property consists of Category I and III Landslide susceptibility. Category I has 0-1 percent susceptibility. Category III has 9-25 percent susceptibility. The project is proposed on the “front” (most easterly) portion of the property which consists of Category I susceptibility which is least susceptible to landslides.

Source: San Mateo County Landslide Susceptibility Mapped Resources.

v. Coastal cliff/bluff instability or erosion?

Note to reader: This question is looking at instability under current conditions. Future, potential instability is looked at in Section 7 (Climate Change).

X

Discussion: The project is not located on a cliff or bluff.

Source: Project location.

6.b. Result in significant soil erosion or the loss of topsoil?

X

Discussion: The front portion of the property has a 30% downslope westward from Skyline Boulevard. A majority of the new residence will be constructed on the 30% sloped area. The rear half of the parcel has a 50% slope, there is a high potential for some erosion to occur during construction. Should the applicant anticipate earthwork operations from October 30 through April 1 (grading moratorium), the applicant will be required to submit a winterization request to conduct grading activities during the moratorium. This request must be submitted prior to Building and Grading Permit issuance and is subject to review and approval by the Community Development Director. The following mitigation measures are recommended to minimize potential erosion.

Mitigation Measure 6: Prior to any land disturbance and throughout the grading operation, the approved erosion control plan, as prepared and signed by the engineer of record, shall be implemented. Prior to issuance of the grading permit “hard card,” the applicant shall submit revised erosion control plan sheets that include the following addition measures for review and approval:

- a. Show the location(s) for storage of construction material, construction equipment, and parking of construction vehicles on the erosion control plan (Sheet C304), as described in Section III (Management Practices Employed to Minimize Contact of Construction Materials, Equipment, and Vehicles with Stormwater) of the Erosion Control Notes and Details plan sheet.
- b. Provide a detail for the proposed silt fencing and protection for stockpiled materials (such as anchored down plastic sheeting in dry weather), as described in Section IV (Construction Material Loading, Unloading, and Access Areas) of the Erosion Control Notes and Details plan (sheet C305).
- c. Show the location(s) of construction staging area(s) on the erosion control plan (Sheet C304), as described in Section IV (Construction Material Loading, Unloading, and Access Areas) of the Erosion Control Notes and Details plan sheet.
- d. Note on the tree protection detail of the Erosion Control Notes and Details plan (Sheet C305) that tree protection shall consist of orange plastic fencing at the driplines where feasible.

- e. Provide a detail for the proposed "Limit of Construction" barrier/fencing (such as orange plastic fencing, chain link fencing, or other barrier measure) on the Erosion Control Notes and Details plan (Sheet C305).
- f. Show the location(s) of any office trailer(s), storage sheds, and/or other temporary installations on the erosion control plan (as applicable). As necessary, show how these temporary structures will be accessed and protection for any access routes.

Mitigation Measure 7: No grading shall be allowed during the winter season (October 1 – April 30) or during any rain event to avoid potential increased soil erosion unless prior written request by the applicant is made to the Community Development Director and approval is granted by the Community Development Director. A grading permit "hard card" is required prior to the start of any land disturbance/grading operation. The applicant shall submit a letter to the Current Planning Section, at least two (2) weeks prior to the commencement of grading, stating the date when grading operation will begin, anticipated end date of grading operation, including dates of revegetation, and estimated date of establishment of newly planted vegetation.

Mitigation Measure 8: The property owner, or designee, shall adhere to the San Mateo County-wide Stormwater Pollution Prevention Program "General Construction and Site Supervision Guidelines," including, but not limited to, the following:

- a. Delineation with field markers of clearing limits, easements, setbacks, sensitive or critical areas, buffer zones, trees, and drainage courses within the vicinity of areas to be disturbed by construction and/or grading.
- b. Protection of adjacent properties and undisturbed areas from construction impacts using vegetative buffer strips, sediment barriers or filters, dikes, mulching, or other measures as appropriate.
- c. Performing clearing and earthmoving activities only during dry weather.
- d. Stabilization of all denuded areas and maintenance of erosion control measures continuously between October 1 and April 30.
- e. Storage, handling, and disposal of construction materials and wastes properly, so as to prevent their contact with stormwater.
- f. Control and prevention of the discharge of all potential pollutants, including pavement cutting wastes, paints, concrete, petroleum products, chemicals, wash water or sediments, and non-stormwater discharges to storm drains and watercourses.
- g. Use of sediment controls or filtration to remove sediment when dewatering site and obtain all necessary permits.
- h. Avoiding cleaning, fueling, or maintaining vehicles on-site, except in a designated area where wash water is contained and treated.
- i. Limiting and timing application of pesticides and fertilizers to prevent polluted runoff.
- j. Limiting construction access routes and stabilization of designated access points.
- k. Avoiding tracking dirt or other materials off-site; cleaning off-site paved areas and sidewalks using dry sweeping methods.
- l. Training and providing instruction to all employees and subcontractors regarding the Watershed Protection Maintenance Standards and construction Best Management Practices.

- m. Additional Best Management Practices in addition to those shown on the plans may be required by the Building Inspector to maintain effective stormwater management during construction activities. Any water leaving the site shall be clear and running slowly at all times.
- n. Failure to install or maintain these measures will result in stoppage of construction until the corrections have been made and fees paid for staff enforcement time.

Mitigation Measure 9: For final approval of the grading permit, the property owner, or designee, shall ensure performance of the following activities within thirty (30) days of grading completion at the project site:

- a. The project engineer shall submit written certification that all grading has been completed in conformance with the approved plans, conditions of approval/mitigation measures, and the County Grading Regulations, to the Department of Public Works and the Planning and Building Department's Geotechnical Section.
- b. The geotechnical consultant shall observe and approve all applicable work during construction, sign Section II of the Geotechnical Consultant Approval form, and submit the signed form to the Planning and Building Department's Geotechnical Section and Current Planning Section.

Source: Project Plans.

6.c. Be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, severe erosion, liquefaction or collapse?			X	
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Discussion: The residence is not located on a geologic unit. There is no evidence that the project site is located in any of these areas.

Source: Submitted Geotechnical report prepared by Romig Engineers, Inc.

6.d. Be located on expansive soil, as noted in the 2010 California Building Code, creating significant risks to life or property?			X	
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Discussion: Per the submitted geotechnical report submitted by the applicant, the site soils have low expansive potential. When the soils get wet, soils will have minimal swell and thereby have minimal impacts to the foundation. If the site did have higher potential expansive soils, the project could be designed to mitigate the expansive soils. See staff's response to Section 6.a.iii.

Source: Submitted Geotechnical report prepared by Romig Engineers, Inc.

6.e. Have soils incapable of adequately supporting the use of septic tanks or alternative wastewater disposal systems where sewers are not available for the disposal of wastewater?				X
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Discussion: The project has been reviewed and received preliminary approval by the Environmental Health Division for both a domestic well and septic system/leach field and is capable of supporting the proposed septic system.

Source: Project Plans.

7. CLIMATE CHANGE. Would the project:

	<i>Potentially Significant Impacts</i>	<i>Significant Unless Mitigated</i>	<i>Less Than Significant Impact</i>	<i>No Impact</i>
7.a. Generate greenhouse gas (GHG) emissions (including methane), either directly or indirectly, that may have a significant impact on the environment?		X		

Discussion: A total of eight trees are proposed for removal. As required by the County's Significant tree ordinance, the project will be conditioned to require replanting at a 1:1 ratio. In context to the surrounding densely forested area, the removal of trees will not release significant amounts of GHG emissions or significantly reduce GHG sequestering in the area. Furthermore, new trees will be planted throughout the project area. The existing trees which continue to help to shade portions of the newly constructed residence. The project's construction is generating minor and temporary traffic, associated with the construction. Since the property is already developed with an existing single family residence, standard daily traffic associated with a single-family residence throughout the year should not be change significantly. The following mitigation measure is recommended to reduce emissions during construction.

Mitigation Measure 10: The applicant shall implement the following basic construction measures at all times:

- a. 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 Toxic Control Measure Title 13, Section 2485 of California Code of Regulations [CCR]). Clear signage shall be provided for construction workers at all access points.
- b. All construction equipment shall be maintained and properly tuned in accordance with manufacturer's specifications. All equipment shall be checked by a certified visible emissions evaluator.
- c. Post a publicly visible sign with the telephone number and person to contact at the lead agency regarding dust complaints. This person, or his/her designee, 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.

Source: San Mateo County Energy Efficiency Climate Action Plan (EECAP); Project Plans; Site Inspection.

7.b. Conflict with an applicable plan (including a local climate action plan), policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases?				X
<p>Discussion: The project does not conflict with the San Mateo county Energy Efficiency Climate Action Plan. A component of the local climate action plan is for new homes to comply with the California Energy Code and the California Building Code, Title 24. These two sections require direct electricity, natural gas and water savings for every new home or business built in California. At the building permit stage, the propose project will be required to comply with the California Building Code, Title 24. See staff's response to Section 7.a.</p> <p>Source: Energy Efficiency Climate Action Plan (Chapter 3).</p>				
7.c. Result in the loss of forestland or conversion of forestland to non-forest use, such that it would release significant amounts of GHG emissions, or significantly reduce GHG sequestering?				X
<p>Discussion: The project site does contain forestland; however, conversion is not considered significant since the property is well vegetated with mature trees and the eight trees to be removed will be replaced at a 1:1 ratio. See staff's response to Section 7.a.</p> <p>Source: Project Plans.</p>				
7.d. Expose new or existing structures and/or infrastructure (e.g., leach fields) to accelerated coastal cliff/bluff erosion due to rising sea levels?				X
<p>Discussion: No, the project is not located on or near a coastal cliff or bluff.</p> <p>Source: Project Location, Site Inspection.</p>				
7.e. Expose people or structures to a significant risk of loss, injury or death involving sea level rise?				X
<p>Discussion: According to the San Mateo County Energy Efficient Climate Action Plan, Figure 19, page 100, the project site is not located in an area expected to be impacted by a sea level rise area.</p> <p>Source: Energy Efficient Climate Action Plan.</p>				
7.f. Place structures within an anticipated 100-year flood hazard area as mapped on a Federal Flood Hazard Boundary or Flood Insurance Rate Map or other flood hazard delineation map?				X

<p>Discussion: The property is in zone X, areas of minimal flooding. (FEMA Panel No. 06081C0280E, effective October 16, 2012).</p> <p>Source: FEMA Maps.</p>					
7.g.	Place within an anticipated 100-year flood hazard area structures that would impede or redirect flood flows?				X
<p>See staff's response to Section 7.f.</p> <p>Source: Project Plans, Geographic Information System.</p>					
7.h.	Be sited, oriented, and/or designed to minimize energy consumption, including transportation energy; incorporate water conservation and solid waste reduction measures; and incorporate solar or other alternative energy sources?				X
<p>Discussion: The project has been designed and sited to minimize significant demand in utilities. The new residence will be required to comply with current building, electrical, plumbing and mechanical codes.</p> <p>Source: Project Plans.</p>					
7.i.	Generate any demands that will cause a public facility or utility to reach or exceed its capacity?			X	
<p>Discussion: The project has received preliminary approval by Skyline County Water District and San Mateo County Environmental Health Division. Electrical and gas service already exists from PG&E.</p> <p>Source: Project Plans, Area Maps.</p>					

8. HAZARDS AND HAZARDOUS MATERIALS. Would the project:					
		Potentially Significant Impacts	Significant Unless Mitigated	Less Than Significant Impact	No Impact
8.a.	Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials (e.g., pesticides, herbicides, other toxic substances, or radioactive material)?				X
<p>Discussion: No such use is proposed.</p> <p>Source: Project Plans.</p>					

8.b. Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment?				X
<p>Discussion: None proposed.</p> <p>Source: Project Plans.</p>				
8.c. Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?				X
<p>Discussion: None proposed.</p> <p>Source: Project Plans.</p>				
8.d. Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment?				X
<p>Discussion: The project site is not a listed hazardous materials site.</p> <p>Source: Department of Toxic Substances Control.</p>				
8.e. For a project located within an airport land use plan or, where such a plan has not been adopted, within 2 miles of a public airport or public use airport, result in a safety hazard for people residing or working in the project area?				X
<p>Discussion: The site is not located within a known area regulated by an airport land use plan nor is it located within 2 miles of a public airport or public use airport.</p> <p>Source: Area Maps.</p>				
8.f. For a project within the vicinity of a private airstrip, result in a safety hazard for people residing or working in the project area?				X
<p>Discussion: No, the project is not located within the vicinity of any known private airstrip.</p> <p>Source: Geographic Information System, Google Maps.</p>				

8.g. Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?				X
<p>Discussion: The project will not impair implementation of or generate any physical interference with any emergency response plan or emergency evacuation plan. Proposed improvements will be required to comply with local and state fire code requirements for adequate access and fire turnaround. The project plans have been reviewed and received preliminary conceptual approval from Cal-Fire. The project includes constructing a fire turnaround on-site which will improve emergency response maneuvering abilities to and within the project area.</p> <p>Source: Project Plans, Review by Cal-Fire.</p>				
8.h. Expose people or structures to a significant risk of loss, injury or death involving wildland fires, including where wildlands are adjacent to urbanized areas or where residences are intermixed with wildlands?			X	
<p>Discussion: The project parcel is located within a High Fire Hazard Severity Zone (State Responsible Area), as mapped by the California Department of Fire and Forestry. The parcel is located in a rural area that has mixed vegetation of mature trees and low-growing vegetation. Project construction and operation could expose people or structures to a significant risk of loss, injury or death involving wildland fires. The project has been reviewed and given preliminary conditional approval by Cal-Fire. As conditioned by Cal-Fire, the project proposes to retain the existing 10,000 water tank.</p> <p>Source: Project Plans.</p>				
8.i. Place housing within an existing 100-year flood hazard area as mapped on a Federal Flood Hazard Boundary or Flood Insurance Rate Map or other flood hazard delineation map?				X
<p>Discussion: The project proposes construction of a single-family residence within Flood Zone X, areas of minimal flooding. FEMA Panel No. 06081C0280E, effective October 16, 2012. See response to Section 7.f.</p> <p>Source: San Mateo County Geographic Information System.</p>				
8.j. Place within an existing 100-year flood hazard area structures that would impede or redirect flood flows?				X
<p>Discussion: See Section 8.i.</p> <p>Source: San Mateo County Geographic Information System.</p>				

8.k.	Expose people or structures to a significant risk of loss, injury or death involving flooding, including flooding as a result of the failure of a levee or dam?				X
<p>Discussion: See Section 8.i. Source: San Mateo County Geographic Information System.</p>					
8.l.	Inundation by seiche, tsunami, or mudflow?				X
<p>Discussion: No, the project site is not located within a tsunami inundation area. Source: County's Tsunami Inundation Map, Woodside.</p>					

9. HYDROLOGY AND WATER QUALITY. Would the project:					
		<i>Potentially Significant Impacts</i>	<i>Significant Unless Mitigated</i>	<i>Less Than Significant Impact</i>	<i>No Impact</i>
9.a.	Violate any water quality standards or waste discharge requirements (consider water quality parameters such as temperature, dissolved oxygen, turbidity and other typical stormwater pollutants (e.g., heavy metals, pathogens, petroleum derivatives, synthetic organics, sediment, nutrients, oxygen-demanding substances, and trash)?			X	
<p>Discussion: Due to proposed grading at the project site, the project has the potential to generate sediment polluted stormwater. The project has been mitigated to include erosion and sediment control measures to reduce potential impacts to less than significant levels. Source: Project Plans.</p>					
9.b.	Significantly deplete groundwater supplies or interfere significantly with groundwater recharge such that there would be a net deficit in aquifer volume or a lowering of the local groundwater table level (e.g., the production rate of pre-existing nearby wells would drop to a level which would not support existing land uses or planned uses for which permits have been granted)?				X
<p>Discussion: The project will retain the existing domestic well. The proposal has been reviewed by the Environmental Health Division and received preliminary approval.</p>					

Source: Project Plans.					
9.c.	Significantly alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, in a manner that would result in significant erosion or siltation on- or off-site?			X	
<p>Discussion: The project site does not have any known stream or river on the property. The project is required to demonstrate compliance with the County's Drainage Policy and Provision C.3.i of the San Francisco Bay Region Municipal Regional Permit, which requires low impact development (LID) measures for the project. Compliance with these regulations is mandatory and would ensure that drainage patterns are not significantly altered and would prevent significant erosion or siltation on or off-site. The project has been reviewed by the Department of Public Works and received preliminary approval.</p> <p>Source: Grading and Drainage Plan.</p>					
9.d.	Significantly alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, or significantly increase the rate or amount of surface runoff in a manner that would result in flooding on- or off-site?			X	
<p>Discussion: See Section 9.c.</p> <p>Source: San Mateo County Department of Public Works Drainage Policy, Project Plans, Geographic Information System.</p>					
9.e.	Create or contribute runoff water that would exceed the capacity of existing or planned stormwater drainage systems or provide significant additional sources of polluted runoff?				X
<p>Discussion: No stormwater drainage systems are existing in this area.</p> <p>Source: Project Plans.</p>					
9.f.	Significantly degrade surface or ground-water water quality?				X
<p>Discussion: There is not expectation that the operation of this single-family residence would affect groundwater water quality.</p> <p>Source: Project Plans.</p>					
9.g.	Result in increased impervious surfaces and associated increased runoff?			X	

Discussion: The proposed project site does include 8,500 sq. ft. of impervious surfaces and the project is required to comply with proper on site drainage. The project also proposes a drainage plan, which has been reviewed and received preliminary approval by the Department of Public Works. Compliance with the County's Drainage Policy and Provision C.3.i of the San Francisco Bay Region Municipal Regional Permit is mandatory and would prevent the creation of significant additional sources of polluted runoff.

Source: Proposed Drainage and Erosion Control Plan.

10. LAND USE AND PLANNING. Would the project:				
	<i>Potentially Significant Impacts</i>	<i>Significant Unless Mitigated</i>	<i>Less Than Significant Impact</i>	<i>No Impact</i>
10.a. Physically divide an established community?				X
<p>Discussion: The project would not result in the physical division of an established community.</p> <p>Source: Project Plans.</p>				
10.b. Conflict with any applicable land use plan, policy or regulation of an agency with jurisdiction over the project (including, but not limited to, the general plan, specific plan, local coastal program, or zoning ordinance) adopted for the purpose of avoiding or mitigating an environmental effect?				X
<p>Discussion: With Planning approval, the project complies with the RM Zoning District and applicable policies of the County's General Plan and Local Coastal Program.</p> <p>Source: Project Plans, Zoning Ordinance, General Plan.</p>				
10.c. Conflict with any applicable habitat conservation plan or natural community conservation plan?				X
<p>Discussion: The property is not located in an area subject to a Habitat Conservation Plan or Natural Conservation Community Plan Community Plan.</p> <p>Source: Biotic Resources Group Biologist Report.</p>				
10.d. Result in the congregating of more than 50 people on a regular basis?				X
<p>Discussion: The project proposed a single-family residence with accessory structures and will not result in the congregating of more than 50 people on a regular basis.</p> <p>Source: Project Plans.</p>				

10.e. Result in the introduction of activities not currently found within the community				X
<p>Discussion The neighboring properties and surrounding area is sparsely developed with existing single-family residences; therefore, the proposed use is not new to the area. The residential use is allowed by the Zoning Regulations upon approval of an Resource Management Permit.</p> <p>Source: Project Plans.</p>				
10.f. Serve to encourage off-site development of presently undeveloped areas or increase development intensity of already developed areas (examples include the introduction of new or expanded public utilities, new industry, commercial facilities or recreation activities)?				x
<p>Discussion: There is no expansion of public facilities proposed that would stimulate development on surrounding properties. Specifically, development of the project would not introduce new or significantly expanded public utilities, new industry, commercial facilities or recreational activities, beyond what already exist on the residential property. Any future development of the area will require approval of a Resource Management Permit.</p> <p>Source: Project Plans.</p>				
10.g. Create a significant new demand for housing?				X
<p>Discussion: The project proposes new housing but does not create new demand for housing.</p> <p>Source: Project Plans.</p>				

11. MINERAL RESOURCES. Would the project:				
	<i>Potentially Significant Impacts</i>	<i>Significant Unless Mitigated</i>	<i>Less Than Significant Impact</i>	<i>No Impact</i>
11.a. Result in the loss of availability of a known mineral resource that would be of value to the region or the residents of the State?				X
<p>Discussion: No, the project is not located in a mapped mineral resources area.</p> <p>Source: County General Plan, Mineral Resources Map.</p>				

11.b. Result in the loss of availability of a locally important mineral resource recovery site delineated on a local general plan, specific plan or other land use plan?				X
<p>Discussion: The project would not affect any nearby mineral resource recovery site, if such a site should exist nearby.</p> <p>Source: Project Plans.</p>				

12. NOISE. Would the project result in:				
	<i>Potentially Significant Impacts</i>	<i>Significant Unless Mitigated</i>	<i>Less Than Significant Impact</i>	<i>No Impact</i>
12.a. Exposure of persons to or generation of noise levels in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies?			X	
<p>Discussion: The project will generate short term noise associate with grading and construction. However, such noises will be temporary, where volume and hours are regulated by Section 4.88.360 (Exemptions) of the County Ordinance Code for Noise Control. Otherwise, any increased long-term project related noise impacts will be minimal as proposed improvements will not generate a significant increase.</p> <p>Source: Project Plans; County Ordinance Code, Section 4.88.360 for Noise Control.</p>				
12.b. Exposure of persons to or generation of excessive ground-borne vibration or ground-borne noise levels?			X	
<p>Discussion: See Section 12.a.</p> <p>Source: Project Plans; County Ordinance Code, Section 4.88.360 for Noise Control.</p>				
12.c. A significant permanent increase in ambient noise levels in the project vicinity above levels existing without the project?			X	
<p>Discussion: The project will generate temporary noise associated with grading and construction. The project does not involve a significant permanent increase in ambient noise levels in the project vicinity, as the project would only result in noise associated with the single-family residence and accessory structures.</p> <p>Source: Project Plans.</p>				

12.d. A significant temporary or periodic increase in ambient noise levels in the project vicinity above levels existing without the project?			X	
<p>Discussion: See Section 12.a.</p> <p>Source: Project Plans, County Ordinance Code, Section 4.88.360 for Noise Control.</p>				
12.e. For a project located within an airport land use plan or, where such a plan has not been adopted, within 2 miles of a public airport or public use airport, exposure to people residing or working in the project area to excessive noise levels?				X
<p>Discussion: No, the project is not located within an area regulated by an airport land use plan or within 2 miles of a public airport or public use airport.</p> <p>Source: Project Location.</p>				
12.f. For a project within the vicinity of a private airstrip, exposure to people residing or working in the project area to excessive noise levels?				X
<p>Discussion: No, the project is not located within the vicinity of any known private airstrip.</p> <p>Source: Project Location.</p>				

13. POPULATION AND HOUSING. Would the project:				
	<i>Potentially Significant Impacts</i>	<i>Significant Unless Mitigated</i>	<i>Less Than Significant Impact</i>	<i>No Impact</i>
13.a. Induce significant population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)?			X	
<p>Discussion: The project will not induce significant population growth in the area, as the project consists of redeveloping one parcel (demolishing an existing single-family residence and building a new 3,568 sq. ft. residence).</p> <p>Source: Project Plans.</p>				

13.b. Displace existing housing (including low- or moderate-income housing), in an area that is substantially deficient in housing, necessitating the construction of replacement housing elsewhere?				X
<p>Discussion: No, the does not involve displacing existing housing.</p> <p>Source: Project Plans.</p>				

<p>14. PUBLIC SERVICES. Would the project result in significant adverse physical impacts associated with the provision of new or physically altered government facilities, the need for new or physically altered governmental facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for any of the public services:</p>				
	<i>Potentially Significant Impacts</i>	<i>Significant Unless Mitigated</i>	<i>Less Than Significant Impact</i>	<i>No Impact</i>
14.a. Fire protection?				X
14.b. Police protection?				X
14.c. Schools?				X
14.d. Parks?				X
14.e. Other public facilities or utilities (e.g., hospitals, or electrical/natural gas supply systems)?				X
<p>Discussion: No, the project will not involve new or physically altered government facilities and would not increase the need for new or physically altered government facilities, nor would the project affect service ratios, response times or other performance objectives for any of the public services in the area.</p> <p>Source: Cal-Fire, Project Plans.</p>				

15. RECREATION. Would the project:				
	<i>Potentially Significant Impacts</i>	<i>Significant Unless Mitigated</i>	<i>Less Than Significant Impact</i>	<i>No Impact</i>
15.a. Increase the use of existing neighborhood or regional parks or other recreational facilities such that significant physical deterioration of the facility would occur or be accelerated?				X
<p>Discussion: No, the project would not increase use of existing neighborhood or regional parks or other recreational facilities. The proposed single-family residence will be a minor change to the area and vicinity. No other new land uses are proposed.</p> <p>Source: Project Plans.</p>				
15.b. Include recreational facilities or require the construction or expansion of recreational facilities which might have an adverse physical effect on the environment?				X
<p>Discussion: The project does not include a recreational facility.</p> <p>Source: Project Plans.</p>				

16. TRANSPORTATION/TRAFFIC. Would the project:				
	<i>Potentially Significant Impacts</i>	<i>Significant Unless Mitigated</i>	<i>Less Than Significant Impact</i>	<i>No Impact</i>
16.a. Conflict with an applicable plan, ordinance or policy establishing measures of effectiveness for the performance of the circulation system, taking into account all modes of transportation including mass transit and non-motorized travel and relevant components of the circulation system, including, but not limited to, intersections, streets, highways and freeways, pedestrian and bicycle paths, and mass transit?				X
<p>Discussion: No, the proposed grading and construction activities will result in a temporary increase in traffic levels to the area. The use of the property remains residential, any permanent increase in traffic levels will be negligible.</p>				

Source: Project Plans, Department of Public Works, CalTrans.				
16.b. Conflict with an applicable congestion management program, including, but not limited to, level of service standards and travel demand measures, or other standards established by the County congestion management agency for designated roads or highways?				X
<p>Discussion: No, the project will have a negligible impact, if any, since the use remains unchanged. Therefore, the project will not conflict with an applicable congestion management program. See staff's response to Section 16.a.</p> <p>Source: Project Plans.</p>				
16.c. Result in a change in air traffic patterns, including either an increase in traffic levels or a change in location that results in significant safety risks?				X
<p>Discussion: The project will not require or result in a change in air traffic patterns.</p> <p>Source: Project Plans, Area Plans.</p>				
16.d. Significantly increase hazards to a design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?				X
<p>Discussion: No, the project will utilize Skyline Boulevard, an existing paved public road. The project will not create a new traffic hazard or introduce an incompatible use that could generate a traffic hazard.</p> <p>Source: Project Plans.</p>				
16.e. Result in inadequate emergency access?				X
<p>Discussion: The project involves the construction of one single-family residence. The project has been reviewed and approved by Cal-Fire and is not expected to impact emergency access.</p> <p>Source: Project Plans, Cal-Fire.</p>				
16.f. Conflict with adopted policies, plans, or programs regarding public transit, bicycle, or pedestrian facilities, or otherwise decrease the performance or safety of such facilities?				X
<p>Discussion: The project involves the redevelopment of a single-family residence and associated grading and does not require any new, or impact any existing, public transit, bicycle, or pedestrian facilities.</p> <p>Source: Project Plans.</p>				

16.g. Cause noticeable increase in pedestrian traffic or a change in pedestrian patterns?				X
Discussion: See Section 16.f. Source: Project Plans.				
16.h. Result in inadequate parking capacity?				X
Discussion: No, the project involves proposed an attached two-car garage with additional on-site parking on the new driveway to accommodate the required parking for the residence and guest parking. Source: Project Plans.				

17. UTILITIES AND SERVICE SYSTEMS. Would the project:				
	<i>Potentially Significant Impacts</i>	<i>Significant Unless Mitigated</i>	<i>Less Than Significant Impact</i>	<i>No Impact</i>
17.a. Exceed wastewater treatment requirements of the applicable Regional Water Quality Control Board?				X
Discussion: None proposed. Project includes a septic system. Source: Project Plans.				
17.b. Require or result in the construction of new water or wastewater treatment facilities or expansion of existing facilities, the construction of which could cause significant environmental effects?				X
Discussion: None proposed. Source: Project Plans.				
17.c. Require or result in the construction of new stormwater drainage facilities or expansion of existing facilities, the construction of which could cause significant environmental effects?				X
Discussion: None proposed. Source: Project Plans.				

17.d. Have sufficient water supplies available to serve the project from existing entitlements and resources, or are new or expanded entitlements needed?				X
<p>Discussion: The project will be retaining and utilizing the existing domestic well. County Environmental Health Division has reviewed the project. No new or expanded entitlements needed.</p> <p>Source: Project Plans.</p>				
17.e. Result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?				X
<p>Discussion: The project proposed a replacement private septic system that has been reviewed and received preliminary approval by the County's Environmental Health Division.</p> <p>Source: Project Plans.</p>				
17.f. Be served by a landfill with insufficient permitted capacity to accommodate the project's solid waste disposal needs?				X
<p>Discussion: The single-family residence will generate a minimal increase in capacity, typical for the use of a residence and the increase is insignificant and will not adversely affect the landfill serving this site, which is not at capacity.</p> <p>Source: Project Plans.</p>				
17.g. Comply with Federal, State, and local statutes and regulations related to solid waste?				X
<p>Discussion: See Section 17.f.</p> <p>Source: Project Plans.</p>				
17.h. Be sited, oriented, and/or designed to minimize energy consumption, including transportation energy; incorporate water conservation and solid waste reduction measures; and incorporate solar or other alternative energy sources?				X
<p>Discussion: The new residence will be required to comply with current building, electrical, plumbing, and mechanical codes.</p> <p>Source: Project Plans.</p>				

17.i. Generate any demands that will cause a public facility or utility to reach or exceed its capacity?				X
<p>Discussion: Skyline Boulevard is the only public facility nearby and traffic impacts will only be temporary and negligible. On-site utilities include a well and septic system; electrical and gas service already exists from PG&E.</p> <p>Source: Project Plans, Area Maps.</p>				

18. MANDATORY FINDINGS OF SIGNIFICANCE.				
	<i>Potentially Significant Impacts</i>	<i>Significant Unless Mitigated</i>	<i>Less Than Significant Impact</i>	<i>No Impact</i>
18.a. Does the project have the potential to degrade the quality of the environment, significantly reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, reduce the number or restrict the range of a rare or endangered plant or animal or eliminate important examples of the major periods of California history or prehistory?			X	
<p>Discussion: None proposed. The project has been mitigated to include a measure protecting any nesting bird species should those exist prior to construction and the removal of the eight trees. Further, Kings Mountain manzanita is no expected to occur within the project site as stated in the Biological Report, though it is not a Federal or State protected species.</p> <p>Source: Submitted Biotic Resources Group Biological Project Report.</p>				
18.b. Does the project have impacts that are individually limited, but cumulatively considerable? (“Cumulatively considerable” means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects.)				X
<p>Discussion: Due to the minor scope of the project, it is unlikely that the incremental effects of this project are considerable when viewed in connection with the effects of past, current, and probable future private or public projects. The project site is located in a rural area where the rate of development is very slow with no significant pending projects nearby.</p> <p>Source: Project Plans.</p>				

18.c. Does the project have environmental effects which will cause significant adverse effects on human beings, either directly or indirectly?				X
<p>Discussion: The project would not cause environmental impacts that could both directly and indirectly cause impacts on human beings. See Section 18.b.</p> <p>Source: Subject Document.</p>				

RESPONSIBLE AGENCIES. Check what agency has permit authority or other approval for the project.

AGENCY	YES	NO	TYPE OF APPROVAL
U.S. Army Corps of Engineers (CE)		X	
State Water Resources Control Board		X	
Regional Water Quality Control Board		X	
State Department of Public Health		X	
San Francisco Bay Conservation and Development Commission (BCDC)		X	
U.S. Environmental Protection Agency (EPA)		X	
County Airport Land Use Commission (ALUC)		X	
CalTrans	X		
Bay Area Air Quality Management District		X	
U.S. Fish and Wildlife Service		X	
Coastal Commission		X	
City		X	
Sewer/Water District:		X	
Other: CA Department of Fish and Wildlife		X	

<u>MITIGATION MEASURES</u>		
	<u>Yes</u>	<u>No</u>
Mitigation measures have been proposed in project application.	X	
Other mitigation measures are needed.	X	
<p>The following measures are included in the project plans or proposals pursuant to Section 15070(b)(1) of the State CEQA Guidelines:</p>		

Mitigation Measure 1: Prior to any grading activities, the following minimum dust control measures shall be implemented and maintained throughout the duration of the project:

- a. Water all active construction and grading areas at least twice daily.
- b. Cover all truck hauling soil, sand, and other loose materials or require all trucks to maintain at least 2 feet of freeboard.
- c. Apply water two times daily, or apply (non-toxic) soil stabilizers on all unpaved access roads, parking areas and staging areas at the project site.
- d. Enclose, cover, water twice daily or apply (non-toxic) soil binders to exposed stockpiles (dirt, sand, etc.).

Mitigation Measure 2: Vegetation removal shall be scheduled to occur between August 1 and March 1 of any given year, which is outside the bird nesting season. If this is not possible, the applicant shall hire a qualified biologist to conduct preconstruction nesting bird surveys no more than 2 weeks prior to vegetation disturbance or removal. If nesting birds are present and may be impacted by the vegetation removal, the biologist shall designate a buffer zone around the nest (e.g., 50 feet for passerines and 200 feet for raptors) where no vegetation removal will take place until the biologist has confirmed that all young have fledged the nest.

Mitigation Measure 3: If during the construction phase any archaeological or historical evidence is uncovered or encountered during construction, the project has been conditioned to halt all excavations of the site within 30 feet and retain an historian/archaeologist to investigate the findings. In addition, the Current Planning Section shall be notified of such findings, and no additional work shall be done on-site, until the historian/archaeologist has recommended appropriate mitigation measures, and those measures have been approved by the Current Planning Section.

Mitigation Measure 4: If during any site activities associated with the project any paleontological resource is discovered, all work within 30 feet shall be halted long enough to call in a qualified paleontologist to assess the find and propose appropriate mitigation measures. In addition, the Current Planning Section shall be notified of such findings, and no additional work shall be done until the paleontologist has recommended appropriate measures, and those measures have been approved by the Current Planning Section and implemented.

Mitigation Measure 5: The property owner, applicant, and contractors must be prepared to carry out the requirements of California State Law with regard to the discovery of human remains during construction, whether historic or prehistoric. In the event that any human remains are encountered during site disturbance, all ground-disturbing work shall cease immediately and the County coroner shall be notified immediately. If the coroner determines the remains to be Native American, the Native American Heritage Commission shall be contacted within 24 hours. A qualified archaeologist, in consultation with the Native American Heritage Commission, shall recommend subsequent measures for disposition of the remains.

Mitigation Measure 6: Prior to any land disturbance and throughout the grading operation, the approved erosion control plan, as prepared and signed by the engineer of record, shall be implemented. Prior to issuance of the grading permit "hard card," the applicant shall submit revised erosion control plan sheets that include the following addition measures for review and approval:

- a. Show the location(s) for storage of construction material, construction equipment, and parking of construction vehicles on the erosion control plan (Sheet C304), as described in Section III (Management Practices Employed to Minimize Contact of Construction Materials, Equipment, and Vehicles with Stormwater) of the Erosion Control Notes and Details plan sheet.
- b. Provide a detail for the proposed silt fencing and protection for stockpiled materials (such as anchored down plastic sheeting in dry weather), as described in Section IV (Construction

Material Loading, Unloading, and Access Areas) of the Erosion Control Notes and Details plan (sheet C305).

- c. Show the location(s) of construction staging area(s) on the erosion control plan (Sheet C304), as described in Section IV (Construction Material Loading, Unloading, and Access Areas) of the Erosion Control Notes and Details plan sheet.
- d. Note on the tree protection detail of the Erosion Control Notes and Details plan (Sheet C305) that tree protection shall consist of orange plastic fencing at the driplines where feasible.
- e. Provide a detail for the proposed "Limit of Construction" barrier/fencing (such as orange plastic fencing, chain link fencing, or other barrier measure) on the Erosion Control Notes and Details plan (Sheet C305).
- f. Show the location(s) of any office trailer(s), storage sheds, and/or other temporary installations on the erosion control plan (as applicable). As necessary, show how these temporary structures will be accessed and protection for any access routes.

Mitigation Measure 7: No grading shall be allowed during the winter season (October 1 – April 30) or during any rain event to avoid potential increased soil erosion unless prior written request by the applicant is made to the Community Development Director and approval is granted by the Community Development Director. A grading permit "hard card" is required prior to the start of any land disturbance/grading operation. The applicant shall submit a letter to the Current Planning Section, at least two (2) weeks prior to the commencement of grading, stating the date when grading operation will begin, anticipated end date of grading operation, including dates of revegetation, and estimated date of establishment of newly planted vegetation.

Mitigation Measure 8: The property owner, or designee, shall adhere to the San Mateo County-wide Stormwater Pollution Prevention Program "General Construction and Site Supervision Guidelines," including, but not limited to, the following:

- a. Delineation with field markers of clearing limits, easements, setbacks, sensitive or critical areas, buffer zones, trees, and drainage courses within the vicinity of areas to be disturbed by construction and/or grading.
- b. Protection of adjacent properties and undisturbed areas from construction impacts using vegetative buffer strips, sediment barriers or filters, dikes, mulching, or other measures as appropriate.
- c. Performing clearing and earthmoving activities only during dry weather.
- d. Stabilization of all denuded areas and maintenance of erosion control measures continuously between October 1 and April 30.
- e. Storage, handling, and disposal of construction materials and wastes properly, so as to prevent their contact with stormwater.
- f. Control and prevention of the discharge of all potential pollutants, including pavement cutting wastes, paints, concrete, petroleum products, chemicals, wash water or sediments, and non-stormwater discharges to storm drains and watercourses.
- g. Use of sediment controls or filtration to remove sediment when dewatering site and obtain all necessary permits.
- h. Avoiding cleaning, fueling, or maintaining vehicles on-site, except in a designated area where wash water is contained and treated.
- i. Limiting and timing application of pesticides and fertilizers to prevent polluted runoff.

- j. Limiting construction access routes and stabilization of designated access points.
- k. Avoiding tracking dirt or other materials off-site; cleaning off-site paved areas and sidewalks using dry sweeping methods.
- l. Training and providing instruction to all employees and subcontractors regarding the Watershed Protection Maintenance Standards and construction Best Management Practices.
- m. Additional Best Management Practices in addition to those shown on the plans may be required by the Building Inspector to maintain effective stormwater management during construction activities. Any water leaving the site shall be clear and running slowly at all times.
- n. Failure to install or maintain these measures will result in stoppage of construction until the corrections have been made and fees paid for staff enforcement time.

Mitigation Measure 9: For final approval of the grading permit, the property owner, or designee, shall ensure performance of the following activities within thirty (30) days of grading completion at the project site:

- a. The project engineer shall submit written certification that all grading has been completed in conformance with the approved plans, conditions of approval/mitigation measures, and the County Grading Regulations, to the Department of Public Works and the Planning and Building Department's Geotechnical Section.
- b. The geotechnical consultant shall observe and approve all applicable work during construction, sign Section II of the Geotechnical Consultant Approval form, and submit the signed form to the Planning and Building Department's Geotechnical Section and Current Planning Section.

Mitigation Measure 10: The applicant shall implement the following basic construction measures at all times:

- a. 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 Toxic Control Measure Title 13, Section 2485 of California Code of Regulations [CCR]). Clear signage shall be provided for construction workers at all access points.
- b. All construction equipment shall be maintained and properly tuned in accordance with manufacturer's specifications. All equipment shall be checked by a certified visible emissions evaluator.
- c. Post a publicly visible sign with the telephone number and person to contact at the lead agency regarding dust complaints. This person, or his/her designee, 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.

DETERMINATION (to be completed by the Lead Agency).

On the basis of this initial evaluation:

 I find the proposed project COULD NOT have a significant effect on the environment, and
X a NEGATIVE DECLARATION will be prepared by the Planning Department.

 I find that although the proposed project could have a significant effect on the environ-
ment, there WILL NOT be a significant effect in this case because of the mitigation
measures in the discussion have been included as part of the proposed project. A
NEGATIVE DECLARATION will be prepared.

 I find that the proposed project MAY have a significant effect on the environment, and an
ENVIRONMENTAL IMPACT REPORT is required.



Olivia Boo

12/22/15

Project Planner

Date

(Title)

ATTACHMENTS

- A. Vicinity Map
- B. Project Information / Site/Roof Plan (Page A-0)
- C. Fire Access Plan (Page A-0.1)
- D. Upper Floor Plan / Main Floor Plan (Page A-1)
- E. Elevation (Page A-2)
- F. Renderings (Page Z-3)
- G. Renderings Existing House and Photos (Page A-3.1)
- H. Grading / Drainage / Utility Plan Front Portion of Parcel (Page C-1)
- I. Grading / Drainage / Utility Plan Rear Portion of Parcel (Page C-2)
- J. Building Cross Section-A / Driveway Profile (Page C-3)
- K. Erosion Plan East (Page C-4)
- L. Erosion Plan West (Page C-5)
- M. Site Grading / Drainage / Utility Plan (Page C-6)
- N. Topographic Survey (Page SU1)
- O. Tree Removal Plan
- P. Biotic Resources Group Biologist Report
- Q. Geotechnical Investigation Report, Romig Engineers, Inc., November 2014

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