

Biological Assessment

24226 Dry Canyon Cold Creek (APN-4455-047-014), Calabasas, Los Angeles County, California

Prepared by:



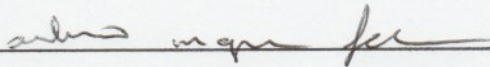
10664 Presilla Road, Santa Rosa Valley, California, 93012

Prepared for:

Zalman N. Inc.
General Building Contractors
6151 Jumilla Ave.
Woodland Hills, CA 91367

**Revised April 6, 2020
October 13, 2017**

This report is a true and accurate statement regarding biological resources located on the property commonly known as 24226 Dry Canyon Cold Creek (APN-4455-047-014), Calabasas, Los Angeles County, California.

_____

Signature

10-13-2017

Date

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LOCATION

The 46,823 square foot (~1.075 acres) property commonly known as 24226 Dry Canyon Cold Creek (APN-4455-047-014), Calabasas, Los Angeles County, California is located on the northern flank of the Santa Monica Mountains about 1.74 mile south of Highway 101 and approximately 260 feet west of Mulholland Highway within the area covered by the U.S. Geological Survey's 7.5-minute Calabasas quadrangle. Single-family residences are located immediately to the south, east, and west. Elevation at the property ranges from approximately 1340 feet (~408 meters) to 1390 feet (~424 meters). The location of the property is depicted in Exhibit A.

PROJECT

The proposed project includes construction of a new, two-story, 2,075 square foot single-family residence with an attached 582 square foot garage, swimming pool and spa, seepage pits, septic tank, driveway, fire department turn around, and fuel modification. Grading for the proposed development will include cut (500 cubic yards), fill (125 cubic yards), and export (375 cubic yards). The site plan is included in Exhibit B. Fuel-modification will extend only to the property boundary.

PURPOSE

The purpose of this report is to determine if the proposed project will affect biological resources including protected trees, special-status species, streams, and wetlands.

DESKTOP REVIEW

Before conducting the site visit, biologist, Andrew McGinn Forde reviewed maps, documents, and a number of other resources including -

1. Aerial photographs dated between 1947 and 2016,
2. The US. Fish and Wildlife Services (USFWS), National Wetlands Inventory,¹
3. The U.S. Department of Agriculture Soil Conservation Service's Web Soil Survey,
4. The California Native Plant Society's (CNPS) Inventory of Rare and Endangered Plants (IREP),²
5. The CDFW California Natural Diversity Database (CNDDDB), Rarefind 5, and the Biogeographic and Observation System (BIOS),³
6. The CDFW list of "Special Animals",⁴
7. The CDFW list of "Fully Protected Animals",⁵
8. The CDFW list of "State and Federally Endangered and Threatened Animals of California",⁶

¹ <http://www.fws.gov/wetlands/Data/Mapper.html>

² California Native Plant Society, 2015, *Inventory of Rare and Endangered Plants*

³ CAL. Fish & Wildlife, Wildlife & Habitat Data Analysis Branch, California Natural Diversity Database, accessed October 7, 2017

⁴ CAL. Fish & Wildlife, Special Animals, July 2017

⁵ CAL. Fish & Wildlife, Fully Protected Animals, May 2003

⁶ CAL. Fish & Wildlife, State & Federally Endangered & Threatened Animals of California, July 2017

9. The CDFW list of “Special Vascular Plants, Bryophytes, and Lichens”,⁷
10. The CDFW list of “State and Federally Listed Endangered, Threatened, and Rare Plants of California”,⁸
11. The USFWS, Sacramento Office’s “Proposed and Candidate Species” system,⁹ and the
12. Los Angeles County’s Sensitive Bird Species.¹⁰

The CNPS IREP tracks the status of hundreds of plant species and includes information on the distribution, ecology, and conservation status of California's rare, threatened, and endangered plants. The CNPS data are widely accepted as the standard for information on the status of the flora of California. The CNPS recognizes more than 1600 plant taxa (species, subspecies and varieties) as rare, threatened, or endangered in California, more than 500 additional species that have limited distribution, and approximately 55 additional species for which the CNPS needs more information. The IREP also contains information on approximately 25 species presumed to have become extinct in California in the last 100 years. The CNDDDB is part of a nationwide network overseen by NatureServe. The CNDDDB is part of a nationwide network overseen by NatureServe. The CNDDDB includes Rarefind 5 and BIOS, which include locations and natural history information on special-status plants and animals and natural communities throughout California. The data help drive conservation decisions, aid in the environmental review of projects and land use changes, and provide baseline data helpful in recovering rare, threatened, and endangered species. The goal of the CNDDDB is to provide the most current information available on the state's most imperiled elements of natural diversity and to provide tools to analyze these data. The species on the CDFW lists are considered to be those of greatest conservation need and are commonly referred to as special-status species.

SURVEY METHODOLOGY

Andrew McGinn Forde visited the property on October 9, 2017. During the site visit, the biologist walked the property in a manner that provided 100% visual coverage in an effort to identify and document biological resources. The biologist mapped the extent of streams and wetlands under jurisdiction of the California Department of Fish and Wildlife (CDFW), the U.S. Army Corp of Engineers (ACOE), and the Regional Water Quality Control Board (RWQCB), native plant communities, protected trees, locations of special-status species, and any resources that could be used by them, if present.

WATERSHEDS

Dudek’s literature review found that the property is located in the Cold Creek-Malibu Creek watershed (Hydrologic Unit Code [HUC] scale 12: 1807010401) within the larger Malibu Creek watershed (HUC scale 10: 1807010401), which are comprised of approximately 27 square miles and 110 square miles, respectively (USGS 2020). Its major tributaries are Las Virgenes Creek, Triunfo Creek, and Cold Creek.

⁷ CAL. Fish & Wildlife, *Special Vascular Plants, Bryophytes, & Lichens*, October 2017

⁸ CAL. Fish & Wildlife, *State & Federally Listed Endangered, Threatened, & Rare Plants of California*, October 2017

⁹ US Fish and Wildlife Service, *Sacramento Fish & Wildlife Office, Proposed & Candidate Species, Threatened & Endangered Species System*, Accessed October 7, 2017

¹⁰ *Western Tanager*, January/February 2009. A Publication of the Los Angeles Audubon, Volume 74:3

STREAMS & WETLANDS

The National Wetlands inventory depicts a stream on the property, which ultimately connects to Malibu Creek. The National Wetlands Inventory map is included as Exhibit C. During the site visit, the biologist determined that the creek varied in width from between 1 to 3 feet from top of bank to top of bank; however, its banks are not well defined along its entire length particularly where it meets the existing driveway that provides access to the single-family residences to the south and east. The biologists did not observe any water within the creek during the site visit. It appears that it is ephemeral in nature. Riparian plant communities dominate the slopes immediately adjacent its banks (see discussion below). The biologist did not observe any adjacent wetlands; however, it is likely that during heavy rain storms that water extends beyond the top of banks and those areas where the banks are not well defined and in fact the area is identified as a flood zone. Exhibit D depicts the location of the stream as mapped by the biologist during the site visit.

PLANT COMMUNITY ALLIANCES

Based on plant community descriptions in Sawyer *et al.* (2009), there are four plant communities that occur on the property.¹¹ The four plant communities are Goodding's Willow - Red Willow Woodland (*Salix gooddingii*-*Salix laevigata* Woodland Alliance), Scrub Oak Chaparral (*Quercus berberidifolia* Shrubland Alliance), Mulefat Thicket - (*Baccharis salicifolia* shrubland Alliance), and Non-Native Wild Oats Grassland (*Avena-Bromus* Semi-Natural Herbaceous Stand). In addition to these plant community alliances there are also four California live oak trees located along the properties eastern boundary and another two immediately adjacent it. Exhibit D includes a map depicting the extents of the communities and the approximate extents of the California live oak trees. Photographs depicting the communities and condition of the property are included as Exhibit E. A complete list of plant species observed during the site visit is included in Exhibit F. The communities are discussed below.

Goodding's Willow - Red Willow Woodland (*Salix gooddingii*-*Salix laevigata* Woodland Alliance)

The woodland occurs in and adjacent the creek. The dominant species are Goodding's willow (*Salix gooddingii*) and red willow (*Salix laevigata*). Also within this community are two, very small southern California black walnut (*Juglans californica*) and two California live oak (*Quercus agrifolia*) trees. Non-native grasses including wild oats (*Avena* sp.) and brome (*Bromus* sp.) dominate the understory.

Scrub Oak Chaparral (*Quercus berberidifolia* Shrubland Alliance)

The Scrub Oak Chaparral (*Quercus berberidifolia* Shrubland Alliance) occurs in two patches on slopes immediately adjacent the creek. The dominant species is scrub oak (*Quercus berberidifolia*). There are no other plants or trees within this community where it occurs on the property.

¹¹ Sawyer, J.O., T. Keeler-Wolf, and J.M. Erens, 2009. *A Manual of California Vegetation*. California Native Plant Society, Sacramento, CA. Second Edition.
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Mulefat Thicket (*Baccharis salicifolia* shrubland Alliance)

This alliance occurs in and immediately adjacent the creek. Mulefat (*Baccharis salicifolia*) is dominant. California Sagebrush (*Artemisia californica*), purple sage (*Salvia leucophylla*), and coyote brush (*Baccharis pilularis*) also occur but are limited to just a handful of each.

Non-Native Wild Oats Grassland (*Avena-Bromus* Semi-Natural Herbaceous Stand)

This community dominates the majority of the property. Dominant species include non-native wild oats, brome, common sow thistle (*Sonchus oleraceus*), fennel (*Foeniculum vulgare*), shortpod mustard (*Hirschfeldia incana*), and star thistle (*Centaurea solstitialis*). A single pepper tree (*Schinus molle*) is located at the properties southern boundary east of the creek and its associated native plant communities. Native species observed within this community included telegraph weed (*Heterotheca grandiflora*) and California fuchsia (*Epilobium canum*).

COMMON WILDLIFE

During the site visit, the biologist observed Great Basin fence lizard (*Sceloporus occidentalis longipes*), western side-blotched lizard (*Uta stansburiana elegans*), Anna's hummingbird (*Calypte anna*), black phoebe (*Sayornis nigricans*), California scrub-jay (*Aphelocoma californica*), California towhee (*Melospiza crissalis*), house finch (*Carpodacus mexicanus*), northern mockingbird (*Mimus polyglottos*), spotted towhee (*Pipilo maculatus*), white-crowned sparrow (*Zonotrichia leucophrys*), and evidence suggesting the presence of Audubon's cottontail (*Sylvilagus audubonii*), coyote (*Canis latrans*), valley pocket gopher (*Thomomys bottae*) and other small mammals. Due to the condition of the property and its proximity to existing single-family residences; only a few other common species are expected to occur. The wildlife inventory is included as Exhibit G.

SPECIAL-STATUS SPECIES

Special-status species include those protected by the State Endangered Species Act,¹² the Federal Endangered Species Act,¹³ the California Fish and Game Code¹⁴ including fully protected species,¹⁵ and all other species that appear on the lists. Mountain lions (*Puma concolor*) range across the entire Santa Monica Mountains and have safely negotiated Highway 101 and Interstate 405. This movement indicates that the Santa Monica Mountains remain relatively connected; therefore, the biologist believes it prudent to consider all special-status species known to occur across the entire mountain range and areas to the north, east, and west. The biologist conducted the CNDDDB, Rarefind 5, BIOS, and IREP reviews by searching the U.S. Geological Service's 7.5-minute Calabasas Beach Quadrangle and those that encompass the Santa Monica Mountains. The review of the CDFW CNDDDB and the CNPS IREP revealed that a number of special-status species have been recorded within the area covered by the quadrangles used in the assessment; however, none occur on or near the property. Important factors to consider when evaluating potential for special-status plant species to occur are geographic location, elevation, vegetation type and structure, and microhabitats. Another important factor is soil types and chemistry.

¹² CAL. Fish & Game Code §§ 2050-2097

¹³ 16 U.S.C. §§ 1531-1544

¹⁴ CAL. Fish & Game Code §§ 3511, 4700, 5050, & 5515

¹⁵ CAL. Fish & Game Code §§ 3511, 4700, 5050, & 5515

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According to the Soil Survey of the Santa Monica Mountains National Recreation Area, the dominant soil types that occur on the property are Cotharin Clay Loam (30% to 75% slopes) and Cumulic Haploxerolls (0% to 9% slopes). The typical profile of Cotharin Clay Loam is described as slightly decomposed plant material (Oe - 0 to 1 inch), which overlies loam (1A - 1 to 9 inches & AC - 9 to 11 inches), which overlies soft, weathered bedrock (Cr - 11 to 21 inches). Parent material is colluvium and/or residuum derived from andesite. It is well drained and is pH 6.0. Cumulic Haploxerolls is described as stratified sandy loam (A - 0 to 16 inches) and stratified clay loam (2Bk - 16 to 69 inches), which overlies extremely gravelly coarse sand (3c - 69 to 83 inches). It is well drained and is pH 7. Parent material is alluvium derived from volcanic and sedimentary rock. A soil map and data are included as Exhibit H. The only special-status plant species the biologist observed on the property was southern California black walnut, which occurs immediately adjacent the banks of the drainage. Based on the condition of the property, the dominant soil types (loams) and chemistry (acidic to neutral), and limited extent of the native plant communities, the biologist does not expect any other special-status plant species to occur. The biologists also determined that southern California legless lizard (*Anniella stebbensi*), San Bernardino ringneck snake (*Diadophis punctatus modestus*), and Allen's hummingbird (*Selasphorus sasin*) have moderate potential to occur within the plant communities that are associated with the drainage. Exhibit I includes all the special-status species returned by the databases that were considered in this assessment (transient and vagrant species are not addressed).¹⁶

NESTING BIRDS

The Migratory Bird Treaty Act protects the majority of migratory birds breeding in the US. The Act specifically states that it is illegal "... for anyone to take ... any migratory bird ... nests, or eggs."¹⁷ "Take" means to harass, harm, pursue, hunt, shoot, wound, kill, trap, capture, or collect, or to attempt to engage in any such conduct.¹⁸ The California Fish & Game Code protects the nest or eggs of all birds and specifically states, "that it is unlawful to take, possess, or needlessly destroy the nest or eggs of any bird."¹⁹ The Code defines "take" as "hunt, pursue, catch, capture, or kill, or attempt to hunt, pursue, catch, capture, or kill."²⁰ The CDFW defines the breeding season in southern California as between February and September; however, a number of species nest outside this timeframe.²¹ For example, Anna's hummingbird nests mid-December to mid-August and mourning dove typically nests February to September but can nest year round,²² which were detected by the biologist during the site visit and could be reasonably expected to nest within the areas dominated by the native plant community alliances. Allan's hummingbird (typically nests February - August) and greater roadrunner (typically nests March - September) could also nest within the native plant communities associated with the drainage. Given the above, the potential for birds to nest at the property throughout most of the year is high. It is unlikely that ground-nesting birds would nest at the property given its proximity to single-family residences.

¹⁶ Transients are species that pass through a geographical area and vagrants are species that are recognized as being outside their normal range.

¹⁷ 16 U.S.C. §§ 703-712, Migratory Bird Treaty Act of 1918 as amended 1936, 1960, 1968, 1969, 1974, 1978, 1986 and 1989

¹⁸ 50 C.F.R. § 10.12

¹⁹ CAL. Fish & Game Code § 3503

²⁰ CAL. Fish & Game Code § 86

²¹ CAL. Fish & Wildlife, Personal Communication, 2012

²² CAL. Fish & Game, Wildlife & Habitat Data Analysis Branch, California's Wildlife, Volume II: Birds, 1988 - 1990, Paul J. Baicich and J. O. Harrison. *A Guide to the Nests, Eggs, and Nestlings of North American Birds*, 1997. Harrison, C. *A Field Guide to the Nests, Eggs and Nestlings of North American birds*, 1978

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CONNECTIVITY - LINKAGES & CORRIDORS

Preservation of linkages between large blocks of core habitat is of the utmost importance in the Santa Monica Mountains. In general, a linkage is a feature that connects at least two blocks of habitat.²³ The assumed function of a linkage is to facilitate dispersal of individuals between blocks of habitat, allowing for long-term genetic interchange.²⁴ Although single-family residences are located immediately south, east, and west of the property, it is likely that birds and mammals make local movements up and down the creek; however, the property does not occur within an area identified as a regional or local linkage.

NATIVE TREE PROTECTION POLICIES

It is the policy of the City of Calabasas to require the preservation of all healthy oak trees unless there are compelling reasons to remove them. The City of Calabasas also limits pruning, removal of branches and trunks, and encroachment into the protected zones of oak trees.²⁵ There are two patches of scrub oak and four California live oak trees located on the property. There are also two California live oaks adjacent the proposed driveway and another two that are located on the property to the east. The approximate locations of the California live oak and the patches of scrub oak are depicted in Exhibit D. An oak tree report is being prepared by Kay Greely and shall be provided under separate cover.

IMPACT ANALYSIS

The proposed single-family residence, garage, swimming pool and spa, seepage pits, septic tank, driveway, fire department turn around are to be located within the area of the property that is dominated by Wild Oats Grassland (*Avena-Bromus* Semi-Natural Herbaceous Stand). The single-family residence and garage are setback approximately 85 feet from the banks of the drainage. The disposal system is approximately 126 feet from the bank of the drainage. The driveway is to be located about 10 feet from the banks of the drainage. As proposed, the biologist does not expect construction of the single-family residence, garage, and driveway to directly affect the drainage, special-status species, local movement of species, or protected oak trees; however, due to the proximity of the proposed development to the drainage, special-status species, and protected trees, recommendations are included below to ensure that these resources are protected during and after construction. The fence that is to be installed is depicted within one of the patches of Scrub Oak Chaparral (*Quercus berberidifolia* Shrubland Alliance). Setting of the fence posts within this area could affect some of the individual trees within the patch. The Natural Resources Map with Site Plan Overlay is included as Exhibit J. The project could also affect nesting birds. Recommendations are included below that will reduce the potential for indirect impacts upon the drainage, special-status species, nesting birds, and protected trees.

²³ Hobbs, R. J., 1992. *The Role of Corridors in Conservation: Solution or Bandwagon?* *Trends in Evolutionary Ecology* 7(11):389-392

²⁴ Rosenberg, D. K., B. R. Noon, and E. C. Meslow, 1997. *Biological Corridors: Form, Function, and Efficacy*. *Bioscience*: November: 677

²⁵ *The protected zone is defined as the area from the trunk to five feet beyond the dripline of the tree or 15 feet from the trunk of the tree, whichever is greater.*

ALTERNATIVES

Rule of reason governs the range of alternatives for any project; therefore, alternatives need only address those that would avoid or reduce significant impacts and those that could feasibly meet the objectives of the project. Economic viability, site geology, availability of infrastructure and utilities, jurisdictional boundaries, location of natural resources, consistency with general plans and local coastal plans are factors that must be considered when addressing alternatives. The proposed single-family residence cannot be moved south, east, or north due to required setbacks. It could conceivably be moved west; however, this would decrease the distance between the proposed development and the drainage (and its associated plant community alliances) and would also increase the distance between the proposed single-family residence and others to the east and south.

RECOMMENDATIONS, AVOIDANCE STRATEGIES, & MITIGATION MEASURES

This section includes recommendations, avoidance strategies, and mitigation measures, as necessary that will reduce the potential for the project to indirectly affect the drainage, special-status species, nesting birds, and protected trees.

1. DESIGN CONSIDERATIONS

- i. The project proponent should consult with the Fire Department so that the drainage and its associated plant communities can be exempted from fuel-modification. This may include the addition of a sprinkler system attached to the outside of the single-family residence and garage and use of non-combustible materials in construction.
- ii. The fence that is to be installed should be pulled back a few feet so that it does not extend into the Scrub Oak Chaparral (*Quercus berberidifolia* Shrubland Alliance).
- iii. Exterior light fixtures shall be minimized where possible along the driveway and the west side of the proposed single-family residence and shall be shielded so that light is not cast across the drainage. Bulbs for exterior lighting along the driveway and on the west side of the proposed single-family residence shall not exceed 60 watts, or the equivalent.
- iv. Some of the slopes adjacent the drainage are dominated by non-native grasses. The non-native grasses shall be removed annually and the slopes planted with native oak trees. The oaks will provide additional habitat for wildlife and will reduce the potential for erosion.
- v. If run-off from impermeable surfaces is to be conveyed to the drainage, the flow shall be captured and treated using gravel drop box structures or other similar devices before discharge.

2. EROSION CONTROL PLAN

The project proponent shall submit to the City of Calabasas, an Erosion Control & Best Management Practices Plan, prepared by a qualified, licensed professional. The qualified, licensed professional shall certify in writing that the plan is in conformance with the county's requirements. The plan shall be designed in a manner that will prevent transportation of sediments into the creek and prevent accidental discharge.

3. DRAINAGE PROTECTION PLAN

An orange construction fence shall be placed between the grading limits and the native plant communities that are associated with the drainage. A silt fence should also be attached to the construction fence and be buried at its base. The fence will help protect the drainage, two patches of scrub oak, two protected California live oak, two southern California black walnut trees, and other special-status species, if present.

Signs shall be placed on or along the length of the fence and shall state -

NO ENTRY - IF ACCIDENTAL DISCHARGE OCCURS IT MUST BE IMMEDIATELY REPORTED TO THE PROJECTS BIOLOGIST.

4. OAK TREE PROTECTION PLAN

An orange construction fence shall be placed 5 feet from the canopy of the oak trees that are not associated with the drainage.

Signs shall be placed on or along the length of the fence and shall state -

NO ENTRY - If ACCIDENTAL DISCHARGE OCCURS IT MUST BE IMMEDIATELY REPORTED TO THE PROJECTS BIOLOGIST.

An oak tree report is being prepared by Kay Greely and shall be provided under separate cover. Please see that report for additional recommendations.

5. NESTING BIRD SURVEY & PROTECTION PLAN

Initial grubbing, grading, and construction should be scheduled to occur outside the nesting season of birds as defined by the CDFW, if feasible. Regardless of timing, a qualified biologist shall conduct a nesting bird surveys before any activities are scheduled to occur. This will reduce the potential for the project to adversely affect nesting birds including special-status species.

- a. The biologist must be familiar with nesting ecology and chronology of southern California species, must have a proven track record of actually finding nests, and must be approved by CDFW and/or preferably holds permits that allow them to survey for nests including those of rare, threatened, and endangered species.
- b. If initial vegetation clearance, grubbing, grading, and construction activities are scheduled to occur outside the CDFW defined nesting season, the biologist should conduct a survey 7 days and again 3 days before the activities are scheduled to begin.
- c. If initial vegetation clearance, grubbing, grading, and construction activities are scheduled to within the CDFW defined nesting season, the biologist should conduct a series of surveys, which should begin 31 days before any scheduled activities, and be conducted one week a part with the final survey being conducted 3 days before schedule activities begin.
- d. The biologist should focus their efforts within the proposed development area and fuel modification zones and check to determine if there are any raptor nests within 300 feet of the development area.
- e. If the biologist determines that there are active nests within or adjacent these areas, they should establish a 100-foot buffer for passerine nests and a 300-foot buffer for raptor nests.
- f. The biologist should clearly mark the buffer area in the field in areas where it overlaps the proposed development area.
- g. No work will occur within a nest buffer under any circumstance unless authorized in writing by the CDFW, or until the fledglings are no longer dependent on the nest, or until the biologist otherwise determines that the nest is inactive.²⁶
- h. The access road can be used even if the buffers of nests extend across it; however, there shall be no stopping within these buffer and under no circumstance can large vehicles or equipment pass within 10 feet of a nest without the presence of the biologist or a statement from the biologist that their presence is not necessary and why.
- i. The biologist should prepare a brief report summarizing the results of the surveys and submit it to the City of Calabasas.

²⁶ Buffer reduction may be appropriate depending on the species involved, ambient levels of human activity/ disturbance, presence of visual and noise barriers, and other factors.
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- j. If the biologist determines that a buffer reduction is feasible, without affecting the outcome of a nest, they shall prepare and submit a letter requesting a reduction to the CDFW along with any necessary information and a statement of justification so that the CDFW can make an informed decision to allow the reduction or not. CDFW buffer reduction approvals must be provided to the City of Calabasas.
 - i. In circumstances when activities are scheduled to occur between an original buffer and a reduced buffer, a qualified biologist should monitor the nest before, during, and after the activities, to determine if it's being affected.
 - ii. The only activities that shall be allowed between the original buffer and the reduced buffer are those that generate noise levels less than 60 dBA as measured at the resource.
 - iii. The biologist shall record noise levels every hour and must have the authority to stop any activities that exceed 60 dBA if they determine that it is affecting, or has the potential to affect the outcome of a nest.
 - iv. The biological monitor shall send weekly monitoring reports to both the CDFW and the City of Calabasas documenting the status of monitored nests and others as necessary. Both shall be notified immediately if project activities results in take.

REPORT PREPARATION

Andrew McGinn Forde prepared this report and the exhibits contained herein.

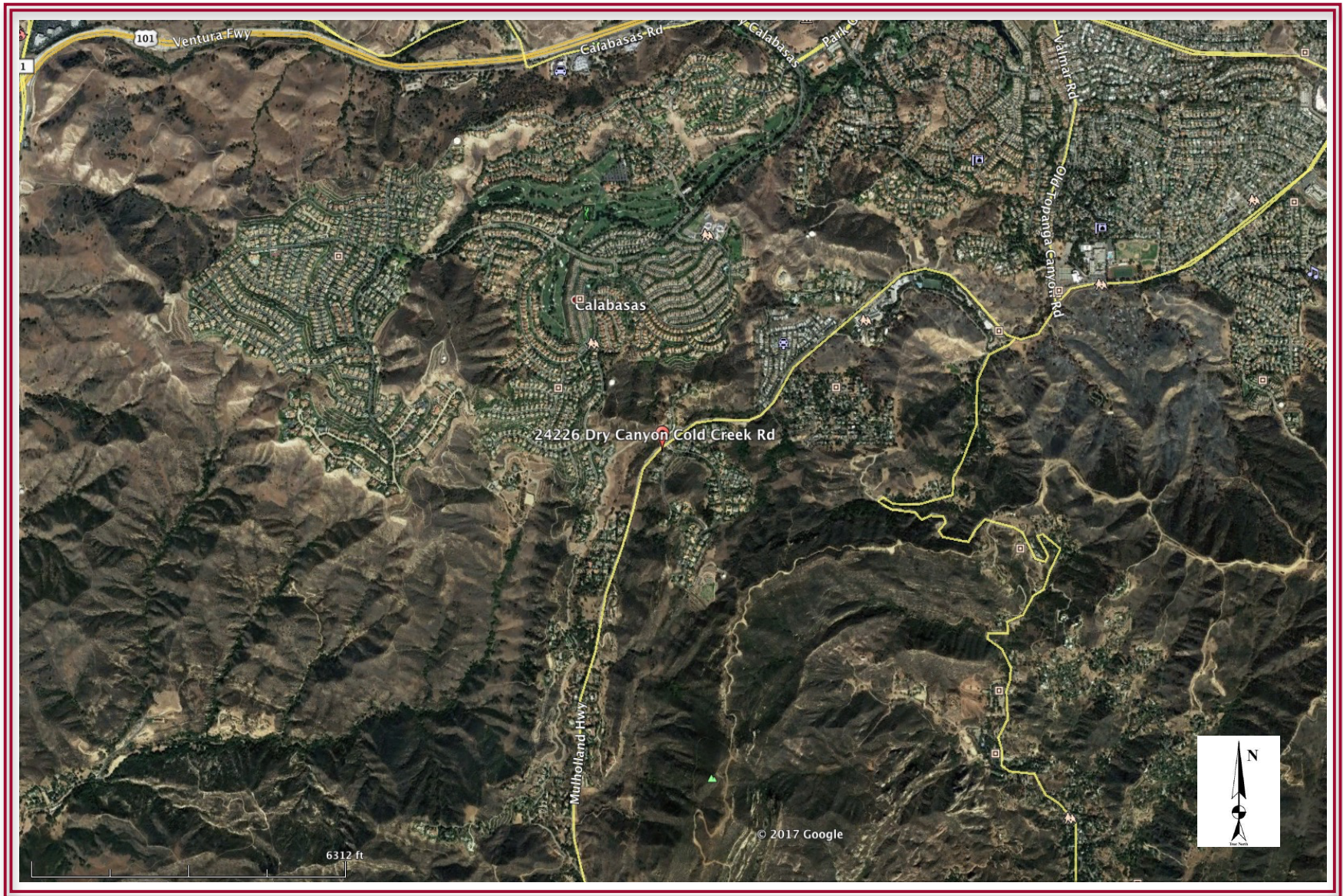


Exhibit A - Area of Interest

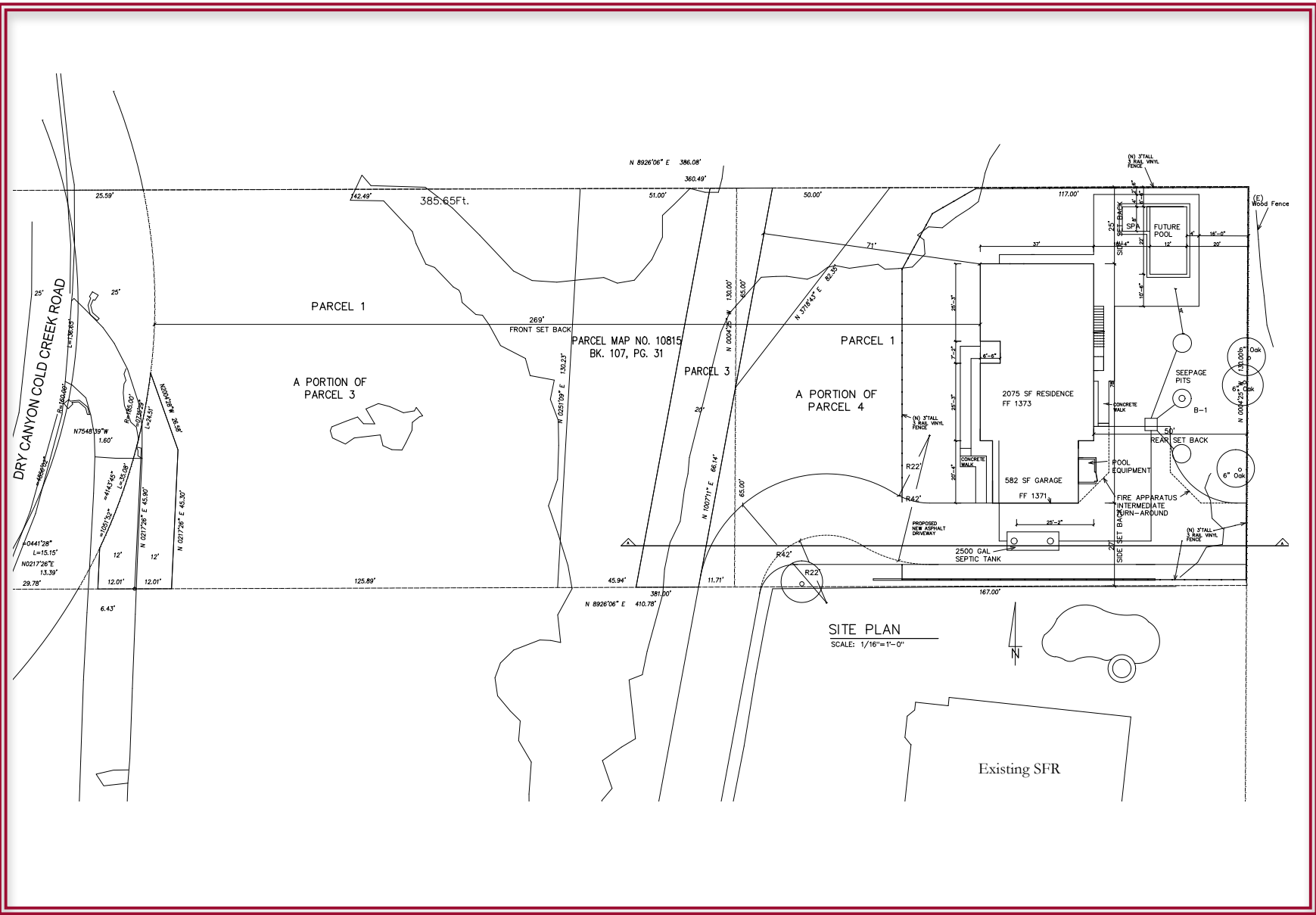


Exhibit B - Site Plan



National Wetlands Inventory (NWI)
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Exhibit C - USFWS National Wetlands Inventory Map

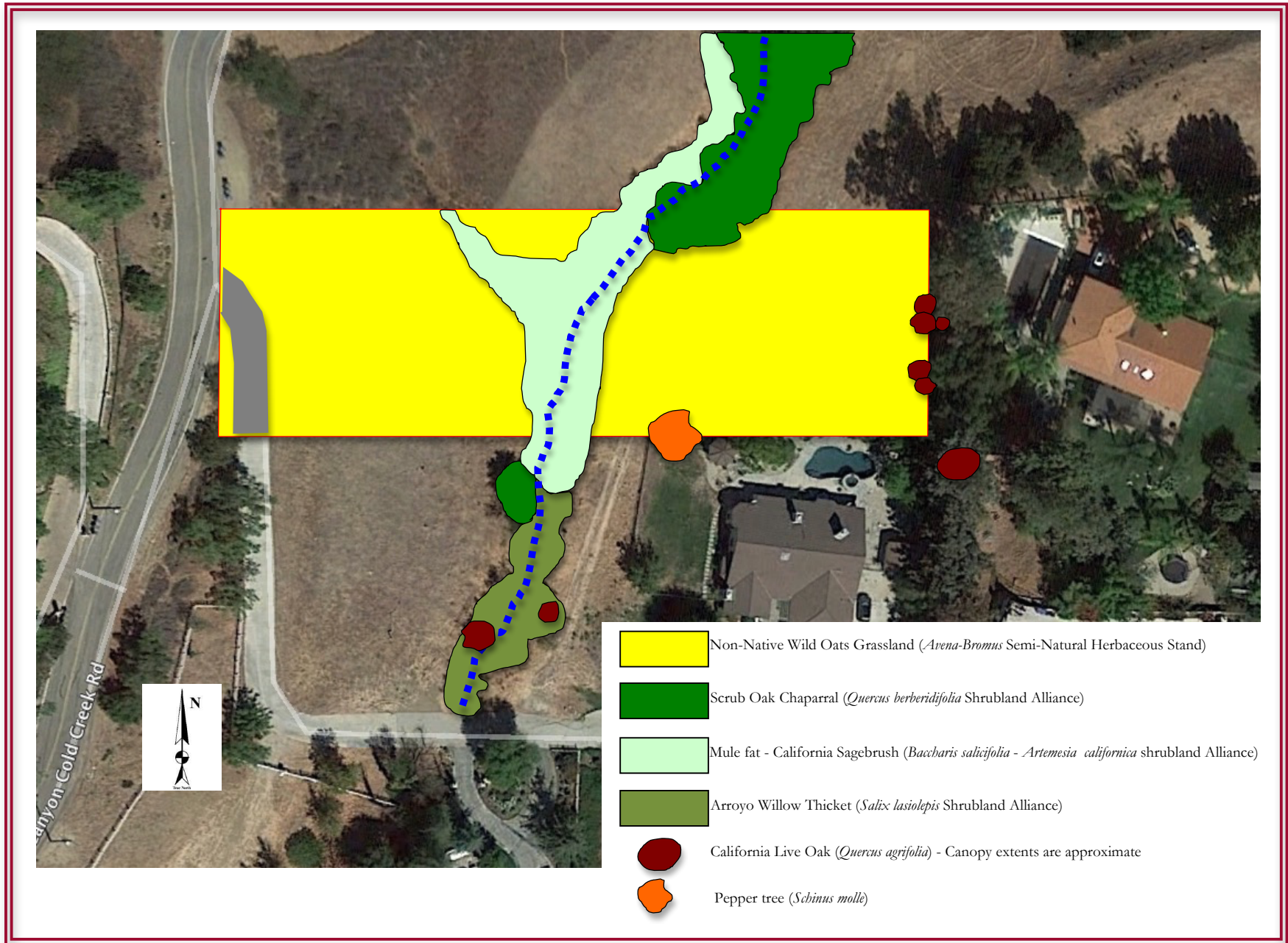


Exhibit D - Natural Resources Map

Photo 1
Description: Proposed driveway area (center)
Drainage and associated Willow
Woodland (left)
Fence adjacent SFR (right)

View: North from existing driveway on
adjacent property to the south.



Photo 2
Description: Proposed development area.

View: Southwest from northeast corner of
property



Photo 3

Description: Willow Woodland

View: Northwest from existing driveway on property to the south.



Photo 4

Description: Scrub Oak chaparral

View: North from southwest corner of proposed development area.

Photo 5

Description: Non-Native Wild Oats Grassland, which dominates the proposed driveway, SFR, & garage locations, and the majority of the proposed fuel modification zone.

View: North from proposed development area



Photo 6

Description: Willow Woodland (foreground, left & center).

Mulefat Thicket (center, right).

View: Northwest from the proposed driveway

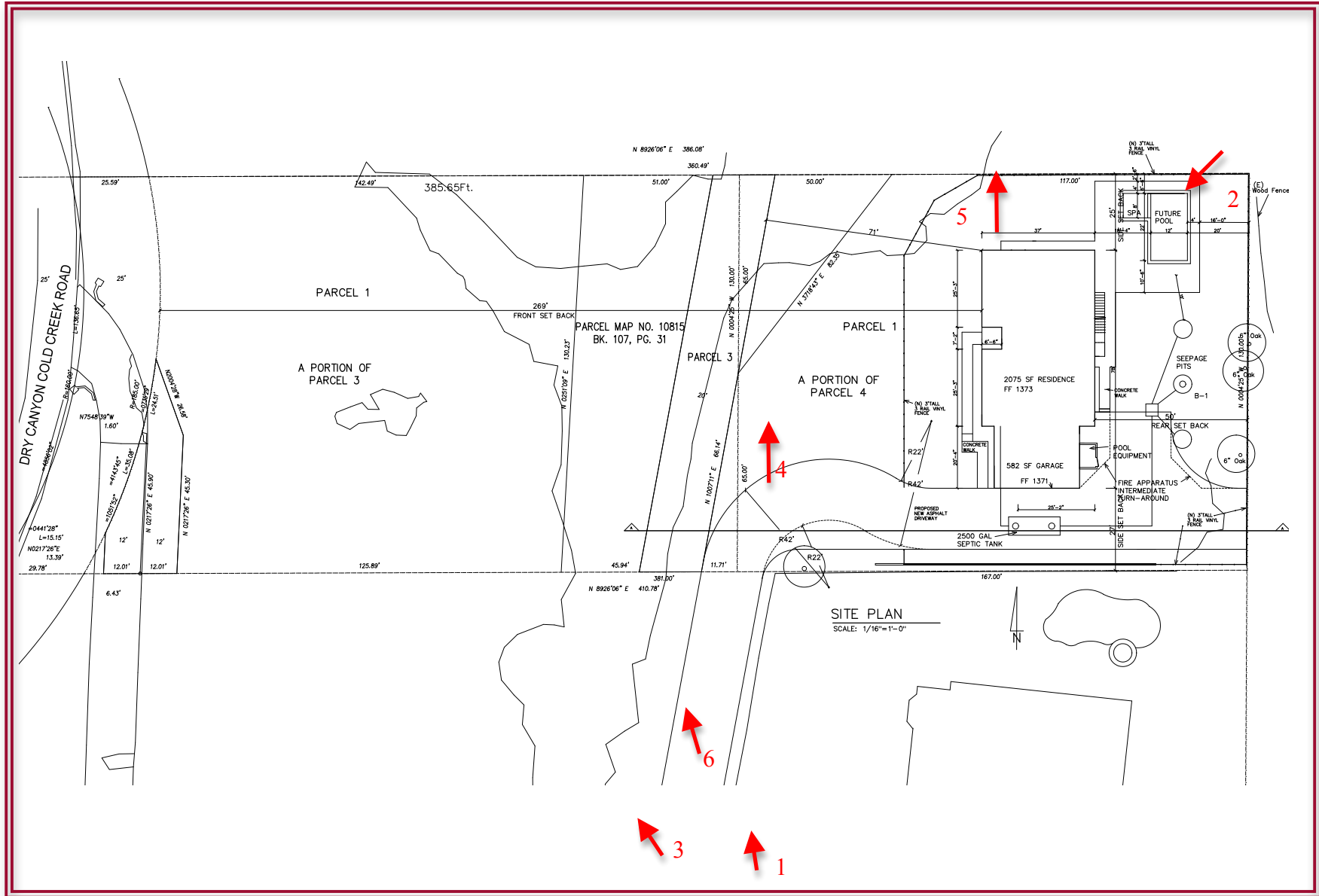


Exhibit E - Photo Locations

* Denotes non-native species

Latin Name	Common Name
Anacardiaceae	Sumac Family
<i>Schinus molle</i> *	Peruvian pepper
Apiaceae	Carrot Family
<i>Foeniculum vulgare</i> Mill.*	fennel
Asteraceae	Sunflower Family
<i>Baccharis salicifolia</i> (Ruiz Lopez & Pavon) Pers.	mule fat
<i>Heterotheca grandiflora</i> Nutt.	telegraph weed
<i>Artemisia californica</i> Less.	California sagebrush
<i>Baccharis pilularis</i> DC.	coyote brush
<i>Centaurea melitensis</i> L.*	star thistle
<i>Sonchus oleraceus</i> L.*	common sow thistle
Brassicaceae	Mustard Family
<i>Hirschfeldia incana</i> (L.) Lagr.-Fossat*	wild mustard, shortpod mustard
Fabaceae	Legume Family
<i>Acmispon glaber</i> (Vogel) Brouillet	deerweed, California broom
Fagaceae	Oak Family
<i>Quercus agrifolia</i> Nee	California live oak
<i>Quercus berberidifolia</i> Liebm.	scrub oak
Geraniaceae	Geranium Family
<i>Erodium cicutarium</i> (L.) L'Her.*	red-stem filaree
Juglandaceae	Walnut Family
<i>Juglans californica</i>	Southern California black walnut
Lamiaceae	Mint Family
<i>Salvia leucophylla</i> Greene	purple sage
Onagraceae	Evening Primrose Family
<i>Epilobium canum</i>	California fuchsia
Poaceae	Grass Family
<i>Avena</i> sp.*	wild oat
<i>Bromus</i> sp.*	brome
Salicaceae	Willow Family
<i>Salix gooddingii</i>	Goodding's willow
<i>Salix Laevigata</i>	Red willow

INVERTEBRATES		
--	--	--
REPTILES		
Phrynosomatidae	<i>Uta stansburiana elegans</i>	Western side-blotched lizard
	<i>Sceloporus occidentalis longipes</i>	Great Basin fence lizard
AMPHIBIANS		
--	--	--
BIRDS		
Corvidae	<i>Apelocoma californica</i>	California scrub-jay
Columbidae	<i>Zenaida macroura</i>	Mourning dove
Trochilidae	<i>Calypte anna</i>	Anna's hummingbird
Tyrannidae	<i>Sayornis nigricans</i>	Black phoebe
Mimidae	<i>Mimus polyglottos</i>	Northern mockingbird
Emberizidae	<i>Melospiza crissalis</i>	California towhee
	<i>Pipilo maculatus</i>	Spotted towhee
Fringillidae	<i>Carpodacus mexicanus</i>	House finch
	<i>Zonotrichia leucophrys</i>	White-crowned sparrow
Passeridae	<i>Passer domesticus</i> *	House sparrow*
MAMMALS		
Leporidae	<i>Sylvilagus audubonii</i> **	Audubon's cottontail**
Canidae	<i>Canis latrans</i> **	Coyote**
Geomysidae	<i>Thomomys bottae</i> ***	Valley pocket gopher***

* = Non-Native Species Flyovers (species observed flying over property or within the immediate vicinity)

** = Scat Detections

*** = Mound, hole, burrow, den, stick house, (as appropriate to species)



Exhibit H - Soil Map & Data

170 - Cotharin Clay Loam, 30 to 75 percent slopes**Map Unit Setting**

General location: High-elevation inland hills and mountains
 Landform: Hills and mountains
 Elevation: 590 to 2,830 feet (180 to 864 meters)
 Mean annual precipitation: 18 to 24 inches (457 to 610 millimeters)
 Mean annual air temperature: 60 to 64 degrees F (16 to 18 degrees C)
 Frost-free period: 290 to 350 days

Map Unit Composition

Cotharin and similar soils - 85 percent
 Minor components - 15 percent

Major Component**Cotharin**

Slope: 30 to 75 percent
 Aspect (clockwise): Dominantly west to northeast
 Position on landform: Hills and mountains
 Parent material: Colluvium and/or residuum derived from andesite
 Typical vegetation: Bigpod chaparral

Selected Properties and Qualities

Surface pH: 6.0
 Surface area covered with coarse fragments: None
 Depth to restrictive feature: Bedrock (paralithic) - 4 to 14 inches
 Slowest permeability class: Moderate above the bedrock
 Salinity: Nonsaline
 Sodicity: Nonsodic
 Available water capacity to a depth of 60 inches: About 1.2 inches (very low)
 Shrink-swell potential: Moderate (LEP 3 to less than 6)
 Soil slippage potential: High

Selected Hydrologic Properties

Present annual flooding: None
 Present annual ponding: None
 Surface runoff: Very high
 Current water table: Not present
 Natural drainage class: Well drained
 Hydrologic soil group: D

California Land Use Interpretive Groups

Farmland classification: Not prime farmland or statewide important farmland

Typical Profile

Oe - 0 to 1 inch; slightly decomposed plant material
 1A - 1 to 9 inches; loam
 AC - 9 to 11 inches; loam
 Cr - 11 to 21 inches; soft, weathered bedrock

Minor Components**Pachic Argixerolls**

Percentage of map unit: About 7 percent
 Slope: 30 to 75 percent
 Landform: Hills and mountains

Rock outcrop

Percentage of map unit: About 5 percent
 Landform: Hills and mountains

Kayiwish

Percentage of map unit: About 2 percent
 Slope: 9 to 30 percent
 Landform: Hills

Boades

Percentage of map unit: About 1 percent
 Slope: 15 to 50 percent
 Landform: Hills and mountains

200 - Cumulic Haploxerolls, 0 to 9 percent slopes

Map Unit Setting

General location: Near rivers and streams
Major uses: Wildlife habitat, recreation, and building site development
Major land resource area (MLRA): 20 - Southern California Mountains
Landform: Mountain valleys and canyons
Elevation: 5 to 895 feet (3 to 274 meters)
Mean annual precipitation: 14 to 24 inches (360 to 610 millimeters)
Mean annual air temperature: 60 to 64 degrees F (16 to 18 degrees C)
Frost-free period: 290 to 350 days

Map Unit Composition

Cumulic Haploxerolls - 85 percent
Minor components - 15 percent

Major Component

Cumulic Haploxerolls

Slope: 0 to 9 percent
Aspect (clockwise): Dominantly east to west
Position on landform: Inset fans
Parent material: Alluvium derived from volcanic and sedimentary rock
Typical vegetation: Arroyo willow and California sycamore

Selected properties and qualities

Surface pH: 7.0
Surface area covered with coarse fragments: None
Depth to restrictive feature: Abrupt textural change - 59 to 79 inches
Slowest permeability class: Moderately slow
Salinity: Nonsaline
Sodicity: Nonsodic
Available water capacity to a depth of 60 inches: About 8.5 inches (high)
Shrink-swell potential: Moderate (LEP 3 to less than 6)
Soil slippage potential: Low

Selected hydrologic properties

Present annual flooding: Frequent
Present annual ponding: None
Surface runoff: Medium
Current water table: Not present
Natural drainage class: Well drained
Hydrologic soil group: B

California land use interpretive groups

Farmland classification: Not prime farmland or statewide important farmland

Typical profile

A - 0 to 16 inches; stratified sandy loam
2Bk - 16 to 69 inches; stratified clay loam
3C - 69 to 83 inches; extremely gravelly coarse sand

Minor Components

Cumulic Haploxerolls, clayey

Percentage of map unit: About 6 percent
Slope: 2 to 9 percent
Position on landform: Inset fans

Riverwash

Percentage of map unit: About 5 percent
Position on landform: Drainageways

Danville, coastal

Percentage of map unit: About 2 percent
Slope: 2 to 9 percent
Position on landform: Alluvial fans and fluvial terraces

Typic Argixerolls

Percentage of map unit: About 2 percent
Slope: 9 to 30 percent
Landform: Hills and mountains

330 - Linne-Los Osos-Haploxerepts association, 30 to 75 percent slopes

Map Unit Setting

Elevation: 800 to 1,700 feet
Mean annual precipitation: 14 to 24 inches
Mean annual air temperature: 60 to 64 degrees F
Frost-free period: 290 to 350 days
Farmland classification: Not prime farmland

Map Unit Composition

Linne and similar soils: 40 percent
Los osos and similar soils: 25 percent
Haploxerepts and similar soils: 20 percent
Minor components: 15 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Linne

Setting

Landform: Hills
Parent material: Residuum weathered from shale

Typical profile

A - 0 to 25 inches: silty clay loam
Bk - 25 to 30 inches: silty clay loam
Cr - 30 to 40 inches: weathered bedrock

Properties and qualities

Surface pH: 8.2
Slope: 30 to 75 percent
Depth to restrictive feature: 20 to 40 inches to paralithic bedrock
Natural drainage class: Well drained
Runoff class: High
Capacity of the most limiting layer to transmit water (Ksat): Very low to low (0.00 to 0.01 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum in profile: 15 percent
Available water storage in profile: Low (about 5.4 inches)

Description of Los Osos

Setting

Landform: Hills
Parent material: Residuum weathered from shale

Typical profile

A - 0 to 9 inches: clay loam
Bk - 9 to 35 inches: clay
Cr - 35 to 45 inches: weathered bedrock

Properties and qualities

Surface pH: 6.1
Slope: 30 to 75 percent
Depth to restrictive feature: 20 to 40 inches to paralithic bedrock
Natural drainage class: Well drained
Runoff class: Very high
Capacity of the most limiting layer to transmit water (Ksat): Very low (0.00 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Available water storage in profile: Low (about 5.6 inches)

Description of Haploxerepts

Setting

Landform: Hills
Landform position (two-dimensional): Backslope
Landform position (three-dimensional): Side slope
Down-slope shape: Concave
Across-slope shape: Concave
Parent material: Colluvium and/or residuum weathered from shale

Typical profile

A - 0 to 4 inches: loam
Bw1 - 4 to 19 inches: channery silty clay loam
Bw2 - 19 to 47 inches: channery silty clay loam
Cr - 47 to 59 inches: weathered bedrock

Properties and qualities

Surface pH: 8.0
Slope: 30 to 75 percent
Depth to restrictive feature: 40 to 59 inches to paralithic bedrock
Natural drainage class: Well drained
Runoff class: Very high
Capacity of the most limiting layer to transmit water (Ksat): Very low to low (0.00 to 0.01 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum in profile: 3 percent
Available water storage in profile: Moderate (about 8.8 inches)

Minor Components

Linne

Percent of map unit: 6 percent
Landform: Hills

Badland

Percent of map unit: 4 percent

Xerorthents

Percent of map unit: 2 percent
Landform: Hills

Cropley

Percent of map unit: 1 percent
Landform: Fans

Elder, coastal

Percent of map unit: 1 percent
Landform: Inset fans

Los osos

Percent of map unit: 1 percent
Landform: Hills

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			ELEVATION RANGE, LIFE FORM, & FLOWERING PERIOD	OCCURRENCE POTENTIAL (See notes at end of table for sources of information)
	Federal Status	State Status	CNPS Global Rank/ State Rank		
<i>Astragalus brauntonii</i> Parish Braunton's milk-vetch	FE January 1997	--	1B.1 G2/S2	4 m - 640 m Perennial Herb January - August	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs in closed-cone coniferous forest, chaparral, coastal sage, valley and foothill grasslands, and recent burn or disturbed areas usually in association with sandstone with carbonate layers or down-wash sites (into which the seeds have drifted). Carbonate outcrops are extremely rare within its current range, and as a result, is naturally rare. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Astragalus pycnostachyus</i> Gray var. <i>lanosissimus</i> (Rydb.) Munz & McBurn. Ventura marsh milk-vetch	FE May 2001	SE April 2000	1B.1 G2T12/S1	1 m - 35 m Perennial Herb June - October	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Rediscovered near Oxnard in 1997 and known from only one natural occurrence composed of 30-50 reproductive plants. This species occurs in coastal dunes and edges of salt or brackish marshes and swamps. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Astragalus tener</i> Gray var. <i>titi</i> (Eastw.) Barneby Coastal dunes milk-vetch	FE August 1998	SE February 1982	1B.1 G2T1/S1	1 m - 50 m Annual Herb March - May	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species is found in coastal bluff scrub with sandy soils, coastal dune, and mesic coastal prairie habitats. The proposed development envelope and fuel modification zone lack suitable habitat elements.

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<i>Atriplex coulteri</i> (Moq.) D. Dietr. Coulter's saltbush	--	--	1B.2 G2/S2	3 m - 460 m Perennial Herb March-October	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species is associated with coastal dune, coastal scrub, coastal bluff scrub, and valley and foothill grassland habitats with alkaline or clay soils. The proposed development envelope and fuel modification zone lack suitable habitat elements. Soils at site are acidic loams.
<i>Atriplex parishii</i> Wats. Parish's brittle scale	--	--	1B.1 G1G2/S1	25 m - 1900 m Annual Herb June - October	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species is associated with chenopod scrub, playas, and vernal pool habitats on alkaline substrates. The proposed development envelope and fuel modification zone lack suitable habitat elements. Soils at site are acidic loams.

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<i>Atriplex serenana</i> A. Nels. var. <i>davidsonii</i> (Standl.) Munz Davidson's saltscale	--	--	1B.2 G5T1/S1	10 m - 200 m Annual Herb April - October	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Associated with coastal bluff scrub and coastal scrub on alkaline substrates. The only record of this taxon in the Santa Monica Mountains is from Malibu Canyon. The proposed development envelope and fuel modification zone lack suitable habitat elements. Soils at site are acidic loams.
<i>Baccharis malibuensis</i> Beauchamp & Henrickson Malibu baccharis	--	--	1B.1 G1/S1	150 m - 305 m Perennial Shrub (Deciduous) August	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Associated with coastal scrub, chaparral, cismontane woodland, and riparian woodland on Conejo Volcanic exposures ¹ in the upper Malibu Creek watershed. The proposed development envelope and fuel modification zone lack suitable habitat elements. There are no exposures of Conejo volcanics.
<i>California macrophylla</i> (Hook.&Arn.) Aldas, Navarro, Vargas, Saez & Aedo Round-leaved filaree	--	--	1B.1 G2/S2	10 m - 1220 m Annual Herb March - May	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species is associated with clay soils in cismontane woodland and grassland. Grass cover is generally low. The proposed development envelope and fuel modification zone lack suitable habitat elements. Soils at site are loams.

¹ Conejo Volcanics occur in western Simi Valley from Big Mountain south through Mountclef Ridge in Santa Rosa Valley, the Conejo Hills, and the western Santa Monica Mountains to the ocean and west through the Malibu Creek watershed and upper Topanga Creek watershed. Skeletal limestone occurs as interbeds and neptunian dikes within the sequence of submarine andesitic / basaltic flows and hyalobrecias of the Conejo Volcanics. The Calabasas Formation, which overlies it, is made up of alternating layers of clayey to silty sandstone and silty shale with some areas having layers of breccia and lenses of chert in the shale.

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	Federal Status	State Status	CNPS Global Rank/ State Rank		
<i>Calystegia sepium</i> (L.) R. Br. ssp. <i>binghamiae</i> (E. Greene) Brummitt Santa Barbara morning-glory	--	--	1A G5TXQ/SX	0 m - 20 m Perennial Herb (Rhizomatous) August	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Coastal marshes and swamps. Presumed extinct.
<i>Calochortus clavatus</i> S. Watson var. <i>gracilis</i> Ownbey Slender mariposa lily	--	--	1B.2 G4T2T3/S2S3	320 m - 1000 m Perennial Herb (Bulbiferous) March - June	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species occurs in shaded canyons and grassy slopes in chaparral and oak woodlands habitats, often associated with serpentinite soils. The proposed development envelope and fuel modification zone lack suitable habitat elements. There are no serpentinite soils and the site is well below the species known elevation range.
<i>Calochortus fimbriatus</i> H. P. McDonald Late-flowered mariposa lily	--	--	1B.3 G3/S3	275 m - 1905 m Perennial Herb (Bulbiferous) June – August	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species occurs in chaparral, cismontane woodland, and riparian woodland often on serpentinite. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Centromadia parryi</i> (Greene) Greene ssp. <i>australis</i> (Keck) B.G. Baldwin Southern tarplant	--	--	1B.1 G3T2/S2	0 m - 425 m Annual Herb May - November	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species occurs along margins of salt marsh and swamps, vernal pools, and vernal mesic valley and foothill grasslands. The proposed development envelope and fuel modification zone lack suitable habitat elements.

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<i>Chaenactis glabriuscula</i> DC var. <i>orcuttiana</i> (Greene) H.M. Hall Orcutt's pincushion	--	--	1B.1 G5T1/S1	< 100 m Annual Herb January - August	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species occurs on coastal dunes and in sandy coastal bluff scrub. The proposed development envelope and fuel modification zone lack suitable habitat elements. There are no coastal dune or coastal bluff scrub habitats.
<i>Chloropyron maritimum</i> (Benth.) A. Heller ssp. <i>maritimum</i> Salt marsh bird's-beak	FE September 1978	SE July 1979	1B.2 G4?T1/S1	0 m - 30 m Annual Herb (Hemiparasitic) May - October	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This taxon occurs in coastal dunes, salt marshes and swamps. The proposed development envelope and fuel modification zone lack suitable habitat elements. There are no coastal dunes, salt marshes, or swamps.
<i>Chorizanthe parryi</i> Wats. var. <i>fernandina</i> (Wats.) Jeps. San Fernando Valley spineflower	FC May 2004	SE August 2001	1B.1 G2T1/S3	150 m - 1035 m Annual Herb April - June	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species occurs in open coastal scrub and grassland on sandy soil. There are no known occurrences in the Santa Monica Mountains south of Highway 101. The proposed development envelope and fuel modification zone lack suitable habitat elements.

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<i>Chorizanthe parryi</i> S. Watson var. <i>parryi</i> Parry's spineflower	--	--	1B.1 G3T3/S3	wide elevation range Annual Herb May - June	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species occurs on dry slopes and flats in sandy soil, typically in coastal scrub, chaparral, grassland, and oak woodland or in edges between these habitats. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Deinandra minthornii</i> (Jeps.) B.G. Baldwin Santa Susana tarplant	--	SR November 1978	1B.2 G2/S2	280 m - 760 m Shrub (Deciduous) July - October	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species occurs in chaparral and coastal scrub habitats in association with sandstone outcroppings and rocky areas. The proposed development envelope and fuel modification zone lack suitable habitat elements. The biologist did not observe this species during the site visit.
<i>Didymodon norrisii</i> Norris' beard moss	--	--	2.2	600 m - 1973 m Bryophyte	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs in seasonally wet sheet drainages within cismontane woodland and lower montane coniferous forest. The proposed development envelope and fuel modification zone lack suitable habitat elements.

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<i>Dodecabema leptoceras</i> (Gray) Rev. & Hardham Slender-horned spineflower	FE	CE	1B.1	200 m - 760 m Annual Herb April - June	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species occurs in chaparral and coastal scrub (alluvial fan). There are no occurrences in the Santa Monica Mountains. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Delphinium parryi</i> Gray ssp. <i>blochmaniae</i> (Greene) Lewis & Epl. Dune larkspur	--	--	1B.2 G4T2/S2	0 m - 200 m Perennial Herb April - May	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This taxon is associated with maritime chaparral and coastal dune habitats. The proposed development envelope and fuel modification zone lack suitable habitat elements. It lacks maritime chaparral and coastal dune habitats.

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	Federal Status	State Status	CNPS Global Rank/ State Rank		
<i>Dithyrea maritima</i> A. Davids. Beach spectaclepod	--	ST February 1990	1B.1 G2/S1	3 m - 50 m Perennial Herb (Rhizomatous) March - May	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species is found in coastal dune and coastal scrub habitats with sandy soils. The proposed development envelope and fuel modification zone lack suitable habitat elements. It lacks sandy soils.
<i>Dudleya blochmaniae</i> (Eastw.) Moran ssp. <i>blochmaniae</i> Blochman's dudleya	--	--	1B.1 G2T2/S2	5 m - 450 m Perennial Herb April - June	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE It mostly occurs in coastal bluff scrub, coastal scrub, and grasslands on open, rocky slopes in shallow clays derived from ultramafic rocks, over serpentinite. ² The proposed development envelope and fuel modification zone lack suitable habitat elements. The biologist did not observe serpentinite outcrops.
<i>Dudleya cymosa</i> (Lemaire) Britton & Rose ssp. <i>agourensis</i> K. Nakai Agoura Hills dudleya	FT January 1997	--	1B.2 G5T1/S2	200 m - 500 m Perennial Herb May - June	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species is restricted to a band of late Pleistocene dissected gravels at road level, east of Kanan Rd, which climbs in elevation west to ~405 meters near Reyes Adobe Rd in an area dominated by chaparral and cismontane woodland habitat. The proposed development envelope and fuel modification zone lack suitable habitat elements. Property is well outside the known range of this species.

² Serpentine rock is apple green to black and often mottled with light and dark colored areas. It has a shiny or wax-like appearance and slightly soapy feel.

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	Federal Status	State Status	CNPS Global Rank/ State Rank		
<i>Dudleya cymosa</i> (Lem.) Britt. & Rose ssp. <i>marcescens</i> Moran Marcescent dudleya	FT January 1997	SR November 1978	1B.2 G5T2/S2	150 m - 520 m Perennial Herb April - July	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Associated with chaparral on lower reaches of sheer volcanic rock surfaces and canyon walls adjacent perennial streams dominated by live oak woodland, often with California Bay. In most locations, topographic relief has prevented deep soil formation; therefore, this dudleya may be the only flowering plant occurring in microhabitat otherwise dominated by mosses, lichens, and ferns. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Dudleya cymosa</i> (Lem.) Britt. & Rose ssp. <i>ovatifolia</i> (Britt.) Moran Santa Monica Mountains dudleya	FT January 1997	--	1B.2 G5T1/S1	150 m - 1675 m Perennial Herb March - June	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs on shaded slopes and canyon bottoms on volcanic and sedimentary conglomerate rock on exposed north-facing slopes from near Westlake Village to Agoura Hills and deep canyon bottoms along lower Malibu Creek and Topanga Creek. The proposed development envelope and fuel modification zone lack suitable habitat elements. There are no volcanic exposures or sedimentary conglomerates.
<i>Dudleya multicaulis</i> (Rose) Moran Many-stemmed dudleya	--	--	1B.2 G2/S2	15 m - 790 m Perennial Herb April - July	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs on clay soils in chaparral, coastal scrub, and valley and foothill grasslands. The proposed development envelope and fuel modification zone lack suitable habitat elements. Soils at the site are loams.

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	Federal Status	State Status	CNPS Global Rank/ State Rank		
<i>Dudleya parva</i> Rose & Davids. Conejo dudleya	FT January 1997	--	1B.2 G2/S2	60 m - 450 m Perennial Herb May - June	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Found in coastal scrub and valley and foothill grassland habitats, most commonly in cactus-dominated coastal sage scrub in association with rocky, gravelly, clay, and volcanic substrates derived from the Conejo volcanics from the western Simi Hills, along the Mountclef Ridge north to the Conejo Grade, a distance of about 10 miles. The proposed development envelope and fuel modification zone lack suitable habitat elements. The property is well outside the species known range.
<i>Dudleya verityi</i> K. Nakai Verity's dudleya	FT January 1997	--	1B.1 G1/S1	60 m - 120 m Perennial Herb May - June	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs on exposures of Conejo volcanics in chaparral, cismontane woodland, and coastal scrub at Conejo Mountain. The proposed development envelope and fuel modification zone lack suitable habitat elements. The property is well outside the species known range.
<i>Eriogonum crocatum</i> A. Davids. Conejo buckwheat	--	SR September 1979	1B.2 G1/S1	50 m - 580 m Perennial Herb April - July	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE The known distribution of this species is limited to the Conejo Valley and surrounding regions in Ventura County where it is found in openings in chaparral, coastal scrub, and valley and grassland habitats on exposures of Conejo Volcanics. The proposed development envelope and fuel modification zone lack suitable habitat elements. The property is well outside the species known range.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			ELEVATION RANGE, LIFE FORM, & FLOWERING PERIOD	OCCURRENCE POTENTIAL (See notes at end of table for sources of information)
	Federal Status	State Status	CNPS Global Rank/ State Rank		
<i>Horkelia cuneata</i> Lindl. var. <i>puberula</i> (Rydb.) Ertter & Reveal Mesa horkelia	--	--	1B.1 G4T1/S1	70 m - 810 m Perennial Herb February - September	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species is found in maritime chaparral, cismontane woodland, and coastal scrub habitats with sandy or gravelly soils. The proposed development envelope and fuel modification zone lack suitable habitat elements. Soils at site are loams.
<i>Isocoma menziesii</i> (H. & A.) G. Nesom var. <i>decumbens</i> (Greene) G. Nesom Decumbent goldenbush	--	--	1B.2 G3G5T2T3/S2	10 m - 135 m Shrub April - November	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This taxon is associated with openings in chaparral and coastal scrub with sandy soils and in disturbed areas. The proposed development envelope and fuel modification zone lack suitable habitat elements. Soils at site are loams.
<i>Juglans californica</i> S. Watson Southern California black walnut	--	--	4.2 G3/S3	50 m - 900 m Deciduous Tree March - June	PRESENT This species is found in slopes, canyons, and alluvial substrates in coastal scrub, chaparral, and cismontane woodland. The biologist observed two small southern California black walnut during the site visit. Both trees are associated with the drainage.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			ELEVATION RANGE, LIFE FORM, & FLOWERING PERIOD	OCCURRENCE POTENTIAL (See notes at end of table for sources of information)
	Federal Status	State Status	CNPS Global Rank/ State Rank		
<i>Lasthenia glabrata</i> Lindl. ssp. <i>coulteri</i> (Gray) Ornduff Coulter's goldfields	--	--	1B.1 G4T2/S2	1 m - 1220 m Annual Herb February - June	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species is found in coastal salt marshes and swamps, playas, grasslands, and vernal pools, usually on alkaline soils. The proposed development envelope and fuel modification zone lack suitable habitat elements. It lacks coastal salt marshes, swamps, playas, grasslands, and vernal pools.
<i>Mobergia calculiformis</i> (W.A. Weber) H. Mayrhofer & Sheard Light gray lichen	--	--	3 G1/S1	-- Crustose Saxicolous Lichen --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE On acidic basalt rocks in association with coastal scrub habitats. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Monardella hypoleuca</i> A. Gray ssp. <i>hypoleuca</i> White-veined monardella	--	--	1B.3 G4T2T3/S2S3	50 m - 1525 m Herb April - December	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species occurs in chaparral and cismontane woodland in rich soil of shady canyon bottoms of the southern Santa Monica Mountains, often growing with <i>Lonicera subspicata</i> , <i>Baccharis plummerae</i> , and <i>Artemisia douglasiana</i> . The proposed development envelope and fuel modification zone lack suitable habitat elements; there are no shady canyon bottoms.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			ELEVATION RANGE, LIFE FORM, & FLOWERING PERIOD	OCCURRENCE POTENTIAL (See notes at end of table for sources of information)
	Federal Status	State Status	CNPS Global Rank/ State Rank		
<i>Nama stenocarpum</i> Gray Mud nama	--	--	2B.2 G4G5/S1S2	5 m - 500 m Annual/Perennial Herb January - July	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species is found in muddy margins of freshwater marshes, swamps, lakes, and rivers. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Navarretia ojaiensis</i> Elvin, J.M. Porter & L.M. Johnson Ojai navarretia	--	--	1B.1 G1/S1	275 m - 620 m Annual Herb May - July	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species is associated with openings in chaparral and coastal scrub, and in valley and foothill grassland habitats. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Nolina cismontana</i> Dice Chaparral nolina	--	--	1B.2 G2/S2	140 m - 1275 m Perennial Shrub (Evergreen) March - July	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species is found in coastal sage scrub and chaparral habitats on sandstone and gabbro substrates. The proposed development envelope and fuel modification zone lack suitable habitat elements. There are no sandstone or gabbro substrates.
<i>Orcuttia californica</i> Vasey California Orcutt grass	FE August 1993	SE September 1979	1B.1 G1/S1	15 m - 660 m Annual Herb April - August	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species is found in vernal pools. The proposed development envelope and fuel modification zone lack suitable habitat elements; there are no vernal pools.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			ELEVATION RANGE, LIFE FORM, & FLOWERING PERIOD	OCCURRENCE POTENTIAL (See notes at end of table for sources of information)
	Federal Status	State Status	CNPS Global Rank/ State Rank		
<i>Pentachaeta lyonii</i> Gray Lyon's pentachaeta	FE January 1997	SE January 1990	1B.1 G2/S2	30 m - 630 m Annual Herb March - August	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs mostly in pocket grassland in chaparral, coastal sage scrub, road/trail edges and sites transitional to shrublands with rocky and clay soils of volcanic origin. It occurs in the central Santa Monica Mountains along the northern slopes, through Thousand Oaks, around the western edge of the Simi Hills to the western edge of City of Simi Valley. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Plagiobryoides vinosula</i> (Cardot) J.R. Spence Wine-colored tufa moss	--	--	4.2 G3G4/S2	30 m - 1735 m Moss --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Usually occurs on granitic rock or granitic soil, sometimes clay, along seeps, streams, meadows, cismontane woodland, riparian woodland, pinyon and juniper woodland, and Mojavean desert scrub. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Quercus dumosa</i> Nutt. Nuttall's scrub oak	--	--	1B.1 G3/S3	15 m - 400 m Shrub February - August	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species is found on sandy soil and clay loam in closed-cone coniferous forest, chaparral, and coastal scrub. The biologists did not observe this species during the site visits.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			ELEVATION RANGE, LIFE FORM, & FLOWERING PERIOD	OCCURRENCE POTENTIAL (See notes at end of table for sources of information)
	Federal Status	State Status	CNPS Global Rank/ State Rank		
<i>Selaginella cinerascens</i> A. A. Eaton Ashy spike moss	--	--	4.1 G3G4/S3	0 m - 640 m Perennial Rhizomatous Herb	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Dry open places of clay soil, clayey-sandy soil, or in shade under shrubs and trees in chaparral and coastal scrub habitats. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Senecio aphanactis</i> Greene Chaparral ragwort	--	--	2B.2 G3?/S2	15 m - 800 m Annual Herb January - April	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs within woodland, chaparral, and coastal scrub habitats on alkaline flats. The proposed development envelope and fuel modification zone lack suitable habitat elements. Soils at site are acidic.
<i>Sidalcea neomexicana</i> Gray Salt spring checkerbloom	--	--	2B.2 G4?/S2S3	15 m -1530 m Perennial Herb March - June	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species is associated with mesic chaparral, coastal scrub, low montane coniferous forest, Mojavean desert scrub, and playas on alkaline substrates. The proposed development envelope and fuel modification zone lack suitable habitat elements. Soils at site are acidic.
<i>Suaeda esteroa</i> Ferren & Whitmore Estuary seablite	--	--	1B.2 G3/S2	0 m -5 m Perennial Herb May - January	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species occurs in coastal salt marshes and swamps. The proposed development envelope and fuel modification zone lack suitable habitat elements.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			ELEVATION RANGE, LIFE FORM, & FLOWERING PERIOD	OCCURRENCE POTENTIAL (See notes at end of table for sources of information)
	Federal Status	State Status	CNPS Global Rank/ State Rank		
<i>Texosporium sancti-jacobi</i> (Tuck.) Nadv. ex Tibell & Hoffsten Woven-spored lichen	--	--	3 G3/S1	290 m - 660 m Crustose Lichen N/A	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Found on soil, small mammal pellets, dead twigs, and moss ferns (<i>Selaginella</i> spp.) in arid to semi-arid grasslands, shrublands, or savannas. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Thelypteris puberula</i> (Baker) C. Morton var. <i>sonorensis</i> A.R. Smith Sonoran maiden fern	--	--	2B.2 G5T3/S2	50 m - 610 m Perennial Herb (Rhizomatous) N/A	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species is associated with meadows and seeps. The proposed development envelope and fuel modification zone lack suitable habitat elements; there are no meadows or seeps.
<i>Tortula californica</i> Bartr. California screw moss	--	--	1B.2 G2/S2	10 m - 1460 m Moss N/A	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species is associated with sandy soil in chenopod scrub and grassland. The proposed development envelope and fuel modification zone lack suitable habitat elements. Soils at site are loams.

Biological Assessment
24226 Dry Canyon Cold Creek (APN-4455-047-014), Calabasas, Los Angeles County, California

STATUS KEY:

Federal	State	
FE: Federally Endangered	SE: State Endangered	CNPS California Rare Plant Rank
FT: Federally Threatened	ST: State Threatened	
FC: Federal Candidate Species	SR: State Rare	Rank 1A: Plants Presumed Extinct in California
	SC: State Candidate	Rank 1B: Plants Rare, Threatened, or Endangered in California and Elsewhere
		Rank 2: Plants Rare, Threatened, or Endangered in California, But More Common Elsewhere
		Rank 3: Plants About Which We Need More Information - A Review List
		Rank 4: Plants of Limited Distribution - A Watch List

- .1-Seriously threatened in California (over 80% of occurrences threatened / high degree and immediacy of threat)
- .2-Fairly threatened in California (20-80% occurrences threatened / moderate degree and immediacy of threat)
- .3-Not very threatened in California (<20% of occurrences threatened / low degree and immediacy of threat or no current threats known)

Potential for Occurrence is based on professional experience, what is known about habitat associations and requirements of the species, and known occurrences in the region. Sources of information consisted of the California Natural Diversity Database and California Native Plant Society Inventory of Rare and Endangered Plants.

Present = Detected during site visit, known to occur, or recently reported to occur
Expected = Suitable habitat is present and species known to occur in the immediate vicinity
High Potential = Suitable habitat is present and species is known to occur frequently in the region
Moderate Potential = Suitable habitat is limited and species occurs in the region infrequently
Low Potential = Species-specific survey negative or marginal habitat is present or temporary in nature and species known to occur in the immediate vicinity (potential for occurrence cannot be ruled out)
Not Expected = Suitable habitat and substrate absent and/or area of interest is located outside known geographical and elevation ranges.

Global Rank (G Rank) is a reflection of the overall status of an element throughout its global range. Both Global and State ranks represent a letter and number score that reflects a combination of Rarity, Threat, and Trend factors, with weighting being heavier on Rarity than the other two. Taxa that are subspecies or varieties receive a taxon rank (T-rank) attached to their G-rank. Where the G-rank reflects the condition of the entire species, the T-rank reflects the global situation of just the subspecies.

GQ = Questionable Taxonomy - Denotes an element that is very rare, but there are taxonomic questions associated with it.
GX = Presumed Extinct - Species not located despite intensive searches and virtually no likelihood of rediscovery. Ecological community or system eliminated throughout its range, with no restoration potential.
GH = Possibly Extinct - Known from only historical occurrences but some hope of rediscovery. Evidence exists that species may be extinct or ecosystem eliminated throughout its range, but not enough to state this with certainty.
G1 = Critically Imperiled - At very high risk of extinction due to extreme rarity (often 5 or fewer populations), very steep declines, or other factors.
G2 = Imperiled - At high risk of extinction due to very restricted range, very few populations (often 20 or fewer), steep declines, or other factors.
G3 = Vulnerable - At moderate risk of extinction due to a restricted range, relatively few populations (often 80 or fewer), recent and widespread declines, or other factors.
G4 = Apparently Secure - Uncommon but not rare; some cause for long-term concern due to declines or other factors.
G5 = Secure - Common; widespread and abundant.
G? = Inexact Numeric Rank
GU = Unrankable
GNR = Unranked
GNA = Not Applicable
C = Captive or Cultivated Only

State Rank (S Rank) is assigned much the same way as the global rank, but state ranks refer to the imperilment status only within California's state boundaries.

SQ = Questionable Taxonomy - Denotes an element that is very rare, but there are taxonomic questions associated with it.
SX = Presumed Extirpated
SH = Possibly Extirpated
S1 = Critically Imperiled - Critically imperiled in the state because of extreme rarity (often 5 or fewer populations) or because of factor(s) such as very steep declines making it especially vulnerable to extirpation from the state.
S2 = Imperiled - Imperiled in the state because of rarity due to very restricted range, very few populations (often 20 or fewer), steep declines, or other factors making it very vulnerable to extirpation from the state.
S3 = Vulnerable - Vulnerable in the state due to a restricted range, relatively few populations (often 80 or fewer) recent and widespread declines, or other factors making it vulnerable to extirpation from the state.
S4 = Apparently Secure - Uncommon but not rare in the state; some cause for long-term concern due to declines or other factors.
S5 = Secure- Common, widespread, and abundant in the state.
S? = Inexact Numeric Rank
SU = Unrankable
SNR = Unranked
SNA = Not Applicable

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ¹
	Federal Status	State Status	CDFW (Season/Region) Global Rank/State Rank LA County (Season/Region)	
INVERTEBRATES				
<i>Helminthoglypta traskii traskii</i> Trask shoulderband	--	--	-- G1G2T1/S1 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE LOW POTENTIAL IN FUEL MODIFICATION ZONE Occurs from coastal Ventura County south into Mexico. Preferred habitat is coastal sage scrub and chaparral. The proposed development envelope lack suitable habitat elements. The plant communities associated with the drainage within the fuel modification zone, appear suitable but very limited in extent.
<i>Helminthoglypta tudiculata convicta</i> Southern shoulderband	--	--	-- G2G3/SNR --	NOT EXPECTED IN DEVELOPMENT ENVELOPE LOW POTENTIAL IN FUEL MODIFICATION ZONE Occurs in the Transverse & Peninsular ranges and the Los Angeles Basin, in annual grassland, coastal scrub, and riparian habitats under rock, leaf litter, decaying yucca, & woody debris. The proposed development envelope lack suitable habitat elements. The plant communities associated with the drainage within the fuel modification zone, appear suitable but very limited in extent.
<i>Haplotrema caelatum</i> Slotted lancetooth	--	--	-- G1/SNR --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Known from Santa Barbara, Ventura, Los Angeles, San Diego, and Ventura Counties in palustrine habitat. The proposed development envelope and fuel modification zone lack suitable habitat elements.

¹ Habitat Notes are taken from California Department of Fish and Wildlife. California Interagency Wildlife Task Group. 2005. California Wildlife Habitat Relationships, Sacramento, California.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ¹
	Federal Status	State Status	CDFW (Season/Region) Global Rank/State Rank LA County (Season/Region)	
<i>Tryonia imitator</i> Mimic tryonia (=California brackishwater snail)	--	--	-- G2/S2 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs along the coast from just north of San Francisco to Ensenada, Mexico in brackish salt marshes and estuarine habitats. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Socalchemmis gertschi</i> Gertsch's socalchemmis spider	--	--	-- G1/S1 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs in sage scrub, chaparral, oak woodland, coniferous forest, generally in rocky outcrops or talus slope. The proposed development envelope and fuel modification zone lack suitable habitat elements. There are no talus slopes.
<i>Streptocephalus woottoni</i> Riverside fairy shrimp	FE August 1993	--	-- G1G2/S1S2 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This species is only found in deep, cool lowland vernal pools that retain water through the warmer weather of late spring and in ditches and road ruts. There are no vernal pools on or adjacent the property.
<i>Trimerotropis occidentiloides</i> Santa Monica grasshopper	--	--	-- G1G2/S1S2 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE LOW POTENTIAL IN FUEL MODIFICATION ZONE Occurs on bare hillsides and along dirt trails in chaparral. The proposed development envelope lack suitable habitat elements. The plant communities associated with the drainage within the fuel modification zone, appear suitable but very limited in extent.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ¹
	Federal Status	State Status	CDFW (Season/Region) Global Rank/State Rank LA County (Season/Region)	
<i>Aglaothorax longipennis</i> Santa Monica shieldback katydid	--	--	-- G1G2/S1S2 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs in the Santa Monica Mountains in chaparral and stream bottom vegetation. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Cicindela hirticollis gravida</i> Sandy beach tiger beetle	--	--	-- G5T2/S1 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Coastal from north of San Francisco into Mexico in moist sand in swales, behind dunes, or upper beaches beyond normal high tides. Most common March through June and August through September. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Cicindela senilis frosti</i> Senile tiger beetle	--	--	-- G2G3T1T3/S1 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs in coastal salt marsh, tidal mud flats, and interior alkali mud flats. Adults active February - June and August - October. They overwinter in shallow underground galleries, usually under flat rocks at edge of habitat. The proposed development envelope and fuel modification zone lack suitable habitat elements.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ¹
	Federal Status	State Status	CDFW (Season/Region) Global Rank/State Rank LA County (Season/Region)	
<i>Cicindela gabbii</i> Western tidal-flat tiger beetle	--	--	-- G2G4/S1 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE It occurs coastal habitats including salt marshes, tidal flats, and beaches from Ventura County into Baja California in dark mud of upper mudflats and salt-pannes. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Coelus globosus</i> Globose dune beetle	--	--	-- G1G2/S1S2 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Inhabits foredunes, sand hummocks, and backdunes from Bodega Bay, south, and some Channel Islands. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Carolella busckiana</i> Busck's gallmoth	--	--	-- G1G3/SH --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs in conifer forests. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Danaus plexippus</i> Monarch butterfly (Overwintering Population)	--	--	-- G5/S3 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Critical features of winter sites are conifer and eucalyptus groves. The proposed development envelope and fuel modification zone lack suitable habitat elements.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ¹
	Federal Status	State Status	CDFW (Season/Region) Global Rank/State Rank LA County (Season/Region)	
<i>Panoquina errans</i> Wandering (=saltmarsh) skipper	--	--	-- G4G5/S2 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs in central California and along the coast from Santa Barbara County south, in salt marshes near beaches and river mouths in stands of <i>Distichlis spicata</i> . The proposed development envelope and fuel modification zone lack suitable habitat elements.

<i>SCIENTIFIC NAME</i> COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ²
	Federal Status	State Status	CDFW (Season/Region) Global Rank/State Rank LA County (Season/Region)	
FISH				
<i>Oncorhynchus mykiss irideus</i> Southern steelhead	FE August 1997	--	SSC G5T3Q/S2 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Young hatch and typically remain in fresh water for 1 - 3 years then swim to the ocean, staying 1 - 2 years before returning to their native streams. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Gila orcutti</i> Arroyo chub	--	--	SSC G2/S2 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Native to Los Angeles, San Gabriel, San Luis Rey, Santa Ana, and Santa Margarita rivers, and Malibu and San Juan creeks and introduced to other rivers and creeks. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Encyclogobius newberryi</i> Tidewater goby	FE February 1994	--	SSC G3/S2S3 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs in cool brackish water of lagoons; favoring salinities less than 10 ppt. Favorable habitat includes shallow open water with emergent vegetation. The proposed development envelope and fuel modification zone lack suitable habitat elements.

² Habitat Notes are taken from California Department of Fish and Wildlife. California Interagency Wildlife Task Group. 2005. California Wildlife Habitat Relationships, Sacramento, California.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ³
	Federal Status	State Status	CDFW (Season/Region) Global Rank/State Rank LA County (Season/Region)	
REPTILES				
<i>Actinemys pallida</i> Southern Western pond turtle	--	--	SSC G3G4/S3 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Associated with permanent or nearly permanent water bodies. May be active year-round. Most often seen basking above the water line. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Phrynosoma blainvillii</i> Coast horned lizard	--	--	SSC G3G4/S3S4 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE The species occurs throughout the foothills and coastal plains from Los Angeles area to northern Baja California. It frequents areas with open vegetation such as chaparral or coastal sage scrub. The proposed development envelope lack suitable habitat elements. The plant communities associated with the drainage within the fuel modification zone, appear suitable but very limited in extent. The biologist did not observe this species during the site visit but it is very cryptic.

³ Habitat Notes are taken from California Department of Fish and Wildlife. California Interagency Wildlife Task Group. 2005. California Wildlife Habitat Relationships, Sacramento, California.
Exhibit I - Regional Special-Status Wildlife Species

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ³
	Federal Status	State Status	CDFW (Season/Region) Global Rank/State Rank LA County (Season/Region)	
<i>Aspidoscelis tigris stejnegeri</i> San Diegan tiger whiptail	--	--	-- G5T3T4/S2S3 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs in valley-foothill hardwood, valley-foothill hardwood-conifer, valley-foothill riparian, mixed conifer, pine-juniper, chaparral, desert scrub, desert wash, alkali scrub, and annual grassland. The proposed development envelope lack suitable habitat elements. The plant communities associated with the drainage within the fuel modification zone, appear suitable but very limited in extent. The biologist did not observe this species during the site visit.
<i>Anniella stebbensi</i> Southern California legless lizard	--	--	SSC G3G4T3T4Q/S3 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE MODERATE POTENTIAL IN FUEL MODIFICATION ZONE Occurs in sparsely vegetated areas of dunes, chaparral, pine-oak woodlands, desert scrub, sandy washes, and stream terraces with sycamores, cottonwoods, or oaks in loose soil and leaf litter. Lives mostly underground. Most active during the morning and evening. The proposed development envelope lacks suitable habitat elements. The plant communities associated with the drainage within the fuel modification zone, appear suitable but very limited in extent. The biologist did not observe this species during the site visit but it mostly lives underground.
<i>Salvadora hexalepis virgulata</i> Coast patch-nosed snake	--	--	SSC G5T4/S2S3 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE LOW POTENTIAL IN FUEL MODIFICATION ZONE Occurs from San Luis Obispo County, south through the coastal zone, south and west of the deserts, into coastal northern Baja California in semi-arid brushy areas and chaparral in canyons, rocky hillsides, and plains. The proposed development envelope lack suitable habitat elements. The plant communities associated with the drainage within the fuel modification zone, appear suitable but very limited in extent.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ³
	Federal Status	State Status	CDFW (Season/Region) Global Rank/State Rank LA County (Season/Region)	
<i>Diadophis punctatus modestus</i> San Bernardino ringneck snake	--	--	-- G5T2T3Q/S2? --	NOT EXPECTED IN DEVELOPMENT ENVELOPE MODERATE POTENTIAL IN FUEL MODIFICATION ZONE This small snake is found in a variety of habitats throughout the state including annual grassland and chaparral. It is usually found under the cover of rocks, wood, bark, boards and other surface debris, but occasionally seen moving on the surface on cloudy days, at dusk, or at night. The proposed development envelope lack suitable habitat elements. The plant communities associated with the drainage within the fuel modification zone, appear suitable but very limited in extent.
<i>Lampropeltis zonata pulchra</i> San Diego mountain kingsnake	--	--	SSC G4G5/S1S2 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Common in the vicinity of rocks or boulders near streams or lakeshores. May also utilize rotting logs and seek cover under dense shrubs. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Thamnophis hammondi</i> Two-striped garter snake	--	--	SSC G4/S3S4 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs from Monterey County west of the Coast Ranges south through the Transverse and Peninsular ranges into Mexico. Primarily aquatic; however, the biologist has observed it some distance from water in the Simi Valley area. The proposed development envelope and fuel modification zone lack suitable habitat elements.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ³
	Federal Status	State Status	CDFW (Season/Region) Global Rank/State Rank LA County (Season/Region)	
<i>Thamnophis sirtalis</i> ssp. South coast garter snake	--	--	SSC (From Ventura to San Diego) G5T1T2/S1S2 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Absent only from Alpine Co. southward (east of the Sierra crest), the southern desert regions, and coastally from northern San Diego Co. south to the Mexican border. Associated with permanent or semi-permanent bodies of water. The proposed development envelope and fuel modification zone lack suitable habitat elements.

<i>SCIENTIFIC NAME</i> COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁴
	Federal Status	State Status	CDFW (Season/Region) Global Rank/State Rank LA County (Season/Region)	
AMPHIBIANS				
<i>Anaxyrus californicus</i> Arroyo toad	FE August 1995	--	SSC G2G3/S2S3 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs in washes, arroyos and riparian areas with willows, sycamores, oaks, and cottonwoods along exposed sandy substrates. Tadpoles sift fine sediments for food and are extremely dependant on this specialized habitat. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Rana aurora draytonii</i> California red-legged frog	FT May 1996	--	SSC G2G3/S2S3 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs in a variety of habitat types, including aquatic, riparian, and upland habitats. They prefer slow moving or deep standing ponds, pools, and streams. They are active all year but will in dry years estivate in moist refuges until the late fall rains. The proposed development envelope and fuel modification zone lack suitable habitat elements.

⁴ Habitat Notes are taken from California Department of Fish and Wildlife. California Interagency Wildlife Task Group. 2005. California Wildlife Habitat Relationships, Sacramento, California.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁴
	Federal Status	State Status	CDFW (Season/Region) Global Rank/State Rank LA County (Season/Region)	
<i>Taricha torosa torosa</i> Coast Range newt	--	--	SSC (Monterey County to South) G4/S4 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs in wet valley-foothill hardwood, hardwood-conifer, mixed conifer, oak woodlands, coastal scrub, chaparral, and annual grasslands. They summer in moist habitats under woody debris, or in rock crevices and animal burrows. Adults migrate in large numbers from terrestrial locations to ponds, reservoirs, and sluggish pools in streams to breed. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Spea hammondi</i> Western spadefoot	--	--	SSC G3/S3 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs in grasslands, chaparral, and pine-oak woodlands preferring open areas with sandy or gravelly soils. Species requires vernal or pools of intermittent streams for breeding. They are typically active October to May. Breeding occurs January - May, 1 - 2 days after heavy rains. The proposed development envelope and fuel modification zone lack suitable habitat elements.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
BIRDS				
<i>Anser albifrons frontalis</i> Greater white-fronted goose	--	--	-- G5T3/S2S3 LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE One of two subspecies that breed in Alaska and winter primarily in California. The other subspecies is the Tule greater white-fronted goose (<i>A. a. gambelli</i>). It frequents open water or unvegetated shorelines for roosting and nearby post-harvest grain fields for foraging. Its primary wintering areas include the Sacramento Valley and the Sacramento San Joaquin River Delta. These areas receive the majority of fall migrants, beginning in late September, peaking by early to mid-November. Some winter in the northern highlands of Mexico. Individuals or small flocks may occur now and then at parks & golf courses within the county. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Chen caerulescens</i> Snow goose	--	--	-- G5/SNR LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE An abundant winter resident found primarily in the Central Valley. Preferred habitats are fresh emergent wetlands, adjacent lacustrine waters, and nearby wet croplands, pastures, meadows, and grasslands. Occasionally found in brackish emergent wetlands and adjacent estuarine waters. Rare along the Coast Ranges and immediate coast but regular in southern California. It generally commutes between evening roosts in tidal marshes or river deltas and diurnal feeding areas on agricultural stubble and pasture. The proposed development envelope and fuel modification zone lack suitable habitat elements.

⁵ Habitat Notes are taken from California Department of Fish and Wildlife. California Interagency Wildlife Task Group. 2005. California Wildlife Habitat Relationships, Sacramento, California.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Branta bernicla</i> Brant	--	--	SSC (Winter & Staging) G5/S2? LA County SBS (Wintering)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Locally common winter resident (October or November to May) along the California coast. It is found in large, shallow estuaries with eelgrass beds, primarily in Humboldt, Tomales, Morro, and San Diego bays, San Diego River mouth, and Drake's Estero, and also in nearby marine waters. Fewer are found on smaller estuaries with sandy or muddy bottoms. Stragglers remain through July. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Dendrocygna bicolor</i> Fulvous whistling-duck	--	--	SSC (Nesting) G5/S1 LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Nests irregularly in California in the Imperial Valley in dense wetlands of cattails along the south end of the Salton Sea. It is found in fresh emergent wetlands, shallow lacustrine and quiet riverine waters; it also feeds in wet croplands and pastures. Fairly common (but declining) in the Imperial Valley March to August and sporadic through winter. Elsewhere in California, it is rare and irregular, with most records from the San Joaquin Valley. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Aythya americana</i> Redhead	--	--	SSC (Nesting) G5/S3S4 LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE From October to March, it is uncommon to locally common south from Modoc to Mono County in lacustrine waters. Also found in the Central Valley, the central valley California foothills, coastal lowlands, and along the coast from Monterey county south, and along the Colorado river. Nests in fresh emergent wetland bordering open water. The proposed development envelope and fuel modification zone lack suitable habitat elements.

Exhibit I - Regional Special-Status Wildlife Species

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Gavia immer</i> Common loon	--	--	SSC (Nesting) G5/S1 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE In summer, rare along northern California coast. From September to May, fairly common in estuarine and subtidal marine habitats along entire coast, and uncommon on large, deep lakes in valleys and foothills throughout state. Common migrant along coast, including offshore, in November and May. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Podiceps nigricollis</i> Eared grebe	--	--	-- G5/SNR LA County (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE A common winter resident in many aquatic habitats throughout California. Nests locally, and irregularly, in small numbers in marshy estuarine habitats of southern California. During migration, fairly common in marine pelagic waters. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Phalacrocorax auritus</i> Double-crested cormorant	--	--	WL (Nesting Colony) G5/S4 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE A yearlong resident along the entire coast of California and on inland lakes, in fresh, salt and estuarine waters. The proposed development envelope and fuel modification zone lack suitable habitat elements.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Pelecanus occidentalis californicus</i> California brown pelican	Delisted December 2009 FE February 2008 FE October 1970	Delisted June 2009 SE June 1971	FP (Nesting Colony & Communal Roosts) G4T3/S1S2 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Estuarine, marine sub tidal, and marine pelagic waters along the California coast. Feeds on fish and occasionally on crustaceans, carrion, and young of its own species. Requires islands for nesting. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Botaurus lentiginosus</i> American bittern	--	--	-- G4/S3S4 LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Distributed widely in winter in fresh emergent wetlands, primarily west of the Sierra Nevada. Less common on coastal slope, Rare August to May in saline emergent wetlands along coast. Elsewhere in lowlands, a rare transient and local winter resident. No longer breeds regularly south of Monterey County The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Ixobrychus exilis</i> Least bittern	--	--	SSC (Nesting) G5/S2 LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE In southern California, common summer resident (especially April to September), at Salton Sea and Colorado River, in dense emergent wetlands near sources of freshwater, and in desert riparian (saltcedar scrub). Probably nests only in emergent wetlands. In deserts and coastal lowlands, quite rare, but breeds locally in the Owens Valley and Mojave Desert. Rare to uncommon April to September in large, fresh emergent wetlands of cattails and tules in San Diego county, and the Sacramento and San Joaquin Valleys, and where it nests. The proposed development envelope and fuel modification zone lack suitable habitat elements.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Ardea Herodias</i> Great blue heron	--	--	-- (Nesting Colony) G5/S4 --	<p>NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL NEST SITES ABSENT</p> <p>NOT EXPECTED IN FUEL MODIFICATION ZONE - POTENTIAL NEST SITES ABSENT</p> <p>Fairly common all year throughout most of California, in shallow estuaries and fresh and saline emergent wetlands. Less common along riverine and rocky marine shores, in croplands, pastures, and in mountains above foothills. This species nest regularly at Malibu Creek just north of Cross Creek Bridge.</p> <p>The proposed development envelope and fuel modification zone lack suitable habitat elements.</p>
<i>Egretta thula</i> Snowy egret	--	--	-- (Nesting Colony) G5/S4 --	<p>NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL NEST SITES ABSENT</p> <p>NOT EXPECTED IN FUEL MODIFICATION ZONE - POTENTIAL NEST SITES ABSENT</p> <p>Widespread in California along shores of coastal estuaries, fresh and saline emergent wetlands, ponds, slow-moving rivers, irrigation ditches, and wet fields. Common September to April in coastal lowlands, but rare through summer. Nests regularly at Malibu Country Mart near Malibu Lagoon.</p> <p>The proposed development envelope and fuel modification zone lack suitable habitat elements.</p>

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Ardea alba</i> Great egret	--	--	-- (Nesting Colony) G5/S4 --	<p>NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL NEST SITES ABSENT</p> <p>NOT EXPECTED IN FUEL MODIFICATION ZONE - POTENTIAL NEST SITES ABSENT</p> <p>Common yearlong resident throughout California, except for high mountains and deserts. Feeds and rests in fresh, and saline emergent wetlands, along the margins of estuaries, lakes, and slow-moving streams, on mudflats and salt ponds, and in irrigated croplands and pastures. Nests and roosts in large trees. Nests regularly at Malibu Country Mart near Malibu Lagoon.</p> <p>The proposed development envelope and fuel modification zone lack suitable habitat elements.</p>
<i>Nycticorax nycticorax</i> Black-crowned night-heron	--	--	-- (Nesting Colony) G5/S4 --	<p>NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL NEST SITES ABSENT</p> <p>NOT EXPECTED IN FUEL MODIFICATION ZONE - POTENTIAL NEST SITES ABSENT</p> <p>Fairly common, yearlong resident in lowlands and foothills throughout most of California. Feeds along the margins of lacustrine, large riverine, and fresh and saline emergent habitats and, rarely, on kelp beds in marine subtidal habitats. Nests and roosts in dense-foliaged trees and dense emergent wetlands. Nests regularly at Malibu Country Mart near Malibu Lagoon.</p> <p>The proposed development envelope and fuel modification zone lack suitable habitat elements.</p>

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Plegadis chibi</i> White-faced ibis	--	--	WL (Nesting Colony) G5/S3S4 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Uncommon summer resident in parts of southern California. It prefers to feed in fresh emergent wetland, shallow lacustrine waters, muddy ground of wet meadows, and irrigated or flooded pastures and croplands. Nests in dense, fresh emergent wetland. This species no longer breeds regularly in California. Local winter visitor along the coast. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Cathartes aura</i> Turkey vulture	--	--	-- G5/SNR LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE MAY FORAGE/FLY OVER PROPERTY Common in breeding season throughout most of California. Absent to uncommon in most of state in winter, with greatest concentrations in coastal regions. Not found at highest elevations in Sierra Nevada. Occurs in open stages of most habitats that provide adequate cliffs or large trees for nesting, roosting, and resting. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Gymnogyps californianus</i> California condor	FE March 1967	SE June 1971	FP G1/S1 LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Permanent resident of the semi-arid, rugged mountain ranges surrounding the southern San Joaquin Valley, including the Coast Ranges from Santa Clara Co. south to Los Angeles Co., the Transverse Ranges, Tehachapi Mts., and southern Sierra Nevada. Forages over wide areas of open rangelands, roosts on cliffs and in large trees and snags. The proposed development envelope and fuel modification zone lack suitable habitat elements.

Exhibit I - Regional Special-Status Wildlife Species

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Pandion haliaetus</i> Osprey	--	--	WL (Nesting) G5/S4 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Associated strictly with large, fish-bearing waters, primarily in ponderosa pine through mixed conifer habitats. Breeds in northern California from Cascade ranges south to Lake Tahoe, and along the coast south to Marin Co. Regular breeding sites include Shasta Lake, Eagle Lake, Lake Almanor, other inland lakes and reservoirs, and northwest river systems. An uncommon breeder along southern Colorado River, and uncommon winter visitor along the coast of southern California. Regularly observed at Malibu Lagoon during winter. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Elanus leucurus</i> White-tailed kite	--	--	FP (Nesting) G5/S3 LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL NEST SITES ABSENT NOT EXPECTED IN FUEL MODIFICATION ZONE - POTENTIAL NEST SITES ABSENT Inhabits grassland, pastures and other herbaceous habitat mostly in cismontane California. For breeding, requires dense clumps of trees or tall shrubs, surrounded by grassland and other open habitats. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Aquila chrysaetos</i> Golden eagle	--	--	FP/WL (Nesting) G5/S3 LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL NEST SITES ABSENT NOT EXPECTED IN FUEL MODIFICATION ZONE - POTENTIAL NEST SITES ABSENT Rolling foothills, mountain areas, sage-juniper flats, and desert habitats with secluded cliffs and overhanging ledges and large trees used for cover. The proposed development envelope and fuel modification zone lack suitable habitat elements.

<i>SCIENTIFIC NAME</i> COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Haliaeetus leucocephalus</i> Bald eagle	Delisted August 2007 FT (Rev.) August 1995 FE (Rev.) March 1978 FE March 1967	SE (Rev.) October 1980 SE June 1971	FP (Nesting & Wintering) G5/S2 LA County SBS (Wintering)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Permanent resident, and uncommon winter migrant, now restricted to breeding mostly in Butte, Lake, Lassen, Modoc, Plumas, Shasta, Siskiyou, and Trinity cos. About half of the wintering population is in the Klamath Basin. More common at lower elevations; not found in the high Sierra Nevada. Fairly common as a local winter migrant at a few favored inland waters in southern California. Largest numbers occur at Big Bear Lake, Cachuma Lake, Lake Mathews, Nacimiento Reservoir, San Antonio Reservoir, and along the Colorado River. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Circus cyaneus</i> Northern harrier	--	--	SSC (Nesting) G5/S3 LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Frequents meadows, grasslands, open rangelands, desert sinks, and both fresh and saltwater wetlands. More widespread in winter, foraging in sparse scrub and agricultural areas including fallow fields. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Accipiter striatus</i> Sharp-shinned hawk	--	--	WL (Nesting) G5/S4 --	MAY FORAGE/FLY OVER PROPERTY DURING MIGRATION & WINTER Winter resident. They breed in coniferous or mixed woodlands and are often found in woodlots, towns, and parks in winter. Species does not nest in Southern California.

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	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Accipiter cooperii</i> Cooper's hawk	--	--	WL (Nesting) G5/S4 --	<p>NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL NEST SITES ABSENT</p> <p>NOT EXPECTED IN FUEL MODIFICATION ZONE - POTENTIAL NEST SITES ABSENT</p> <p>Dense stands of live oak, riparian deciduous, or other forest habitats near water used most frequently. Nests in deciduous trees in crotches 3-23 m (10-80 ft), but usually 6-15 m (20-50 ft), above the ground. Also nests in conifers on horizontal branches, in the main crotch, often just below the lowest live limbs. Usually nests in second-growth conifer stands, or in deciduous riparian areas, usually near streams.</p> <p>The proposed development envelope and fuel modification zone lack suitable habitat elements. Cold Creek is suitable for this species.</p>
<i>Accipiter gentilis</i> Northern goshawk	--	--	SSC (Nesting) G5/S3 --	<p>NOT EXPECTED IN DEVELOPMENT ENVELOPE</p> <p>NOT EXPECTED IN FUEL MODIFICATION ZONE</p> <p>Breeds in North Coast Ranges through Sierra Nevada, Klamath, Cascade, and Warner Mts., in Mt. Pinos and San Jacinto, San Bernardino, and White Mts. Remains yearlong in breeding areas as an uncommon resident. Prefers middle and higher elevations, and mature, dense conifer forests. Casual in winter along north coast, throughout foothills, and in northern deserts, where it may be found in pinyon-juniper and low-elevation riparian habitats.</p> <p>The proposed development envelope and fuel modification zone lack suitable habitat elements.</p>

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Parabuteo unicinctus</i> Harris's hawk	--	--	WL (Nesting) G5/S1 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Historically occurred year-round in the Lower Colorado River Valley from near Needles to the Imperial National Wildlife Refuge, with a small disjunct breeding population at the south end of the Salton Sea. Mostly extirpated in the 1960's. Now a rare yearlong resident of southern Salton Sea and Imperial valley. Inhabits semiopen desert scrub, desert wash, and desert riparian habitats for nesting and foraging. Needs scattered small trees or saguaro cactuses for hunting perches and nest structures. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Buteo swainsoni</i> Swainson's hawk	--	ST April 1983	-- (Nesting) G5/S3 LA County SBS (Breeding)	MAY FORAGE OVER PROPERTY DURING MIGRATION Breeds in isolated stands of trees in juniper-sage flats, riparian areas, and in oak savannah, forages in grasslands, suitable grain fields, alfalfa fields, and livestock pastures. The only known nest sites in southern California are within the Antelope Valley. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Buteo regalis</i> Ferruginous hawk	--	--	WL (Wintering) G4/S3S4 LA County SBS	MAY FORAGE OVER PROPERTY DURING MIGRATION & WINTER Winter resident. Frequents grasslands and agricultural areas. The proposed development envelope and fuel modification zone lack suitable habitat elements.

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	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Falco columbaris</i> Merlin	--	--	WL (Wintering) G5/S3S4 --	MAY FORAGE/FLY OVER PROPERTY DURING MIGRATION & WINTER Uncommon winter migrant from September to May. Seldom found in heavily wooded areas, or open deserts. Frequents coastlines, open grasslands, savannahs, woodlands, lakes, wetlands, edges, and early successional stages. Ranges from annual grasslands to ponderosa pine and montane hardwood-conifer habitats. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Falco mexicanus</i> Prairie falcon	--	--	WL (Nesting) G5/S4 LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL NEST SITES ABSENT NOT EXPECTED IN FUEL MODIFICATION ZONE - POTENTIAL NEST SITES ABSENT Uncommon permanent resident that ranges from southeastern deserts northwest throughout the Central Valley and along the inner Coast Ranges and Sierra Nevada. Distributed from annual grasslands to alpine meadows, but associated primarily with perennial grasslands, savannahs, rangeland, some agricultural fields, and desert scrub areas but nesting is generally confined to sheltered cliff ledges, potholes, and caves in rugged terrain. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Falco peregrinus anatum</i> Peregrine falcon	Delisted August 1999 FE June 1970	Delisted November 2009 SE June 1971	FP (Nesting) G4T4/S3S4 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL NEST SITES ABSENT NOT EXPECTED IN FUEL MODIFICATION ZONE - POTENTIAL NEST SITES ABSENT Breeds mostly in woodland, forest, and coastal habitats. Migrants occur along the coast in spring and fall. The proposed development envelope and fuel modification zone lack suitable habitat elements.

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	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Porzana carolina</i> Sora	--	--	-- G5/SNR LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Frequents saline emergent wetlands in the nonbreeding season. Probably breeds regularly in southern California. Historical nesting localities include Big Bear Lake in the San Bernardino Mts. and the Owens Valley, Inyo Co. There are a few summer records from the Salton Sea district and along the coastal lowlands. In winter, northern and high-elevation populations migrate southward. Widespread along the southern California coast in winter, as well as at the Salton Sea and the Colorado River, and visitors occasionally reach the Channel Islands. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Laterallus jamaicensis coturniculus</i> California black rail	--	ST June 1971	FP G3G4T1/S1 LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE It occurs in tidal emergent wetlands dominated by pickleweed, or in brackish marshes supporting bulrushes in association with pickleweed. In freshwater, usually found in bulrushes, cattails, and saltgrass. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Rallus longirostris obsoletus</i> California clapper rail	FE October 1970	SE June 1971	-- G5T1/S1 LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Locally common yearlong in coastal wetlands and brackish areas around San Francisco, Monterey, and Morro bays. Prefers emergent wetland dominated by pickleweed and cordgrass, and brackish emergent wetland dominated by bulrush. Requires shallow water and mudflats for foraging, with adjacent higher vegetation for cover during high water. Does not occur in the region.

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	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Rallus longirostris levipes</i> Light-footed clapper rail	FE October 1970	SE June 1971	FP G5T1T2/S1 LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Requires emergent or brackish emergent wetlands and tidal sloughs dominated by pickleweed, cord grass and bulrush. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Rallus longirostris yumanensis</i> Yuma clapper rail	FE March 1967	ST February 1978 SE June 1971	-- G5T3/S1 LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE In coastal saline emergent wetlands along southern California from Santa Barbara Co. to San Diego Co. Prefers emergent wetland dominated by pickleweed and cordgrass, and brackish emergent wetland dominated by bulrush. Requires shallow water and mudflats for foraging, with adjacent higher vegetation for cover during high water. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Rallus limicola</i> Virginia Rail	--	--	-- G5/SNR LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE A fairly common resident in California. In summer, breeds in fresh emergent wetlands and wet meadows the length of the state. Feeds in tall, emergent vegetation by probing in mud and wading in shallow water. Nests in cattails, bulrushes, and other emergent vegetation in freshwater marshes. Areas may be quite small, but must have some open water and tall, emergent vegetation to support a nesting pair. Nests on the ground, hidden by vegetation, suspended between stems above water, or perched on grass tussocks. The proposed development envelope and fuel modification zone lack suitable habitat elements.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Grus canadensis canadensis</i> Lesser sandhill crane	--	--	SSC (Wintering) G5T4/S3S4 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Concentrates on the Carrizo Plain with smaller flocks near Brawley and Blythe. Outside of known wintering grounds, extremely rare except that migrates over much of interior California. A few coastal sightings from Marin Co. southward. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Grus canadensis tabida</i> Greater sandhill crane	--	ST April 1983	FP (Nesting & Wintering) G5T4/S2 LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Historically, a fairly common breeder on northeastern plateau. Now reduced greatly in numbers, and breeds only in Siskiyou, Modoc and Lassen cos. and in Sierra Valley, Plumas and Sierra cos. In summer, it occurs in and near wet meadow, shallow lacustrine, and fresh emergent wetland habitats. It winters primarily in the Sacramento and San Joaquin valleys from Tehama Co. south to Kings Co., where it frequents annual and perennial grassland habitats, moist croplands with rice or corn stubble, and open, emergent wetlands. It prefers relatively treeless plains. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Charadrius alexandrinus nivosus</i> Western snowy plover	FT April 1993	--	SSC (Nesting) G3T3/S2 LA County SBS (Coastal & Inland)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Primarily occurs and nests on coastal beaches, sand spits, dune-backed beaches, sparse dunes, beaches at creek and river mouths, salt pans at lagoons and estuaries. Less commonly, on bluff-backed beaches, dredged material disposal sites, salt pond levees, dry salt ponds, and river bars. The proposed development envelope and fuel modification zone lack suitable habitat elements.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Charadrius montanus</i> Mountain plover	--	--	-- (Wintering) G3/S2? LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Population declining and very local; occasionally fairly common. Winter resident from September through March. Found on short grasslands and plowed fields of the Central Valley from Sutter and Yuba cos. southward. Also found in foothill valleys west of San Joaquin Valley, Imperial Valley, plowed fields of Los Angeles and western San Bernardino counties, and the central Colorado river valley. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Haematopus bachmani</i> Black oystercatcher	--	--	-- (Nesting) G5/S4 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE A permanent resident on rocky shores of marine habitats along almost the entire California coast, and on adjacent islands. Uncommon to locally fairly common in northern and central California and on Channel Islands. Rare on mainland coast south of Pt. Conception (Santa Barbara Co.). Breeds on undisturbed, rocky, open ocean shores. Nesting ledges must be available beyond the reach of ocean waves, and inaccessible to terrestrial predators. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Numenius americanus</i> Long-billed curlew	--	--	WL (Nesting Colony) G5/S2 LA County SBS (Wintering)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE An uncommon to fairly common breeder from April to September in wet meadow habitat in northeastern California in Siskiyou, Modoc, and Lassen cos. Breeds on grazed, mixed-grass and shortgrass prairies. Uncommon to locally very common as a winter visitor from early July to early April along most of the California coast. Preferred winter habitats include large coastal estuaries, upland herbaceous areas, and croplands. The proposed development envelope and fuel modification zone lack suitable habitat elements.

Exhibit I - Regional Special-Status Wildlife Species

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Larus californicus</i> California gull	--	--	WL (Nesting Colony) G5/S4 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE It is abundant in coastal and interior lowlands in nonbreeding season. In April, begins to depart for breeding grounds. Nests on islands in alkali or freshwater lakes and salt ponds in the northeastern plateau region and at Mono Lake. In late summer, migrates westward across the Sierra Nevada from interior nesting grounds to winter in California and the Pacific Northwest. Preferred habitats along the coast are sandy beaches, mudflats, rocky intertidal, and pelagic areas of marine and estuarine habitats, as well as fresh and saline emergent wetlands. Inland, it frequents lacustrine, riverine, and cropland habitats, landfill dumps, and open lawns in cities. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Sterna forsteri</i> Forster's tern	--	--	-- (Nesting Colony) G5/S4 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Common to abundant along the coast of California in marine subtidal and estuarine waters from May to September. Also common to uncommon inland at open lacustrine and riverine habitats. Uncommon along the coast north of Sonoma Co. Nests on salt-pond levees and low islands in emergent wetlands and bays, on open to fairly open levees. Also uses matted reedbeds, sometimes floating. There is a southward migratory movement in fall, with most of the northern California population wintering from southern California south to South America. The proposed development envelope and fuel modification zone lack suitable habitat elements.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Hydroprogne caspia</i> Caspian tern	--	--	-- (Nesting Colony) G5/S4 LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Common along the California coast and at scattered locations inland, from April through early August. Adults often fly substantial distances to forage in lacustrine, riverine, and fresh and saline emergent wetland habitats. Nests in dense colonies on sandy estuarine shores, on levees in salt ponds, and on islands in alkali and freshwater lakes. A few individuals nest along the coast and within the county at Port of Los Angeles and Port of Long Beach. Winters from southern California, where it is locally fairly common, south to Central and South America. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Thalasseus maximus</i> Royal tern			-- G5/SNR LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Fairly common, but localized winter visitor to offshore waters and coast of southern California, north to San Luis Obispo County but extremely rare north of this region and the North American interior. Feeds over pelagic waters; less commonly inshore. Roosts on tidal flats and beaches. A few individuals nest along the coast and within the county at Port of Los Angeles and Port of Long Beach. The proposed development envelope and fuel modification zone lack suitable habitat elements.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Thalasseus elegans</i> Elegant tern			WL (Nesting Colony) G2/S2 LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Breeding individuals arrive in coastal southern California in early March and are augmented with post-breeders from Mexico in June. Becomes common by July. Most depart by October. Preferred habitats are inshore coastal waters, bays, estuaries, and harbors; rarely occurs far offshore, and never inland. Thousands of individuals nest within the county at Port of Los Angeles and Port of Long Beach but their colonies are threatened. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Rynchops niger</i> Black skimmer			SSC (Nesting Colony) G5/S2 LA County (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE A fairly common summer resident at the Salton Sea. Usually arrives by late April and departs by October, breeding in most recent years. Increasingly frequent visitor to coastal estuaries and river mouths of southern California, and accidental at a few other interior locations. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Sterna antillarum browni</i> California least tern	FE October 1970	SE June 1971	FP (Nesting Colony) G4T2T3Q/S2S3 LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE A summer resident, it arrives at breeding grounds along marine and estuarine shores late April in southern California. Feeds in shallow estuaries or lagoons where small fish are abundant. The proposed development envelope and fuel modification zone lack suitable habitat elements.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Coccyzus americanus occidentalis</i> Western yellow-billed cuckoo	FT November 2014	SE March 1988 ST June 1971	-- (Nesting) G5T3Q/S1 LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Nearly extirpated in southern California, now a rare summer resident of extensive valley, foothill and desert riparian habitats along river bottoms. Requires densely foliated deciduous trees and shrubs, especially willows, for nesting and mature cottonwoods for foraging. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Geococcyx californianus</i> Greater roadrunner	--	--	-- G5/SNR LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL NEST SITES ABSENT MODERATE POTENTIAL IN FUEL MODIFICATION ZONE - POTENTIAL NEST SITES PRESENT A yearlong resident in arid, brushy habitats below about 900 m (3000 ft) in coast ranges, foothills and valleys. Fairly common in all desert habitats. Uncommon in a variety of other habitats. Most numerous in open areas with scattered bushes or thickets, or in chaparral edging on sparsely vegetated grassland. The proposed development envelope lacks suitable habitat elements. The plant communities associated with the drainage are suitable.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Asio otis</i> Long-eared owl	--	--	SSC (Nesting) G5/S3? LA County SBS (Wintering & Breeding)	<p>NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL NEST SITES ABSENT</p> <p>NOT EXPECTED IN FUEL MODIFICATION ZONE - POTENTIAL NEST SITES ABSENT</p> <p>Occurs in the state year round, although seasonal status varies regionally; breeds from February through July. Uncommon yearlong resident throughout the state except the Central Valley and Southern California deserts where it is an uncommon winter visitor. Riparian habitat required; also uses live oak thickets and other dense stands of trees. It occurs along the Santa Clara River (Pers. Obs.) and presumed to breed there. Also known to nest in Big Tujunga Wash</p> <p>The proposed development envelope and fuel modification zone lack suitable habitat elements. Dry Canyon Creek consists of marginally suitable habitat for this species.</p>
<i>Asio flammeus</i> Short-eared owl	--	--	SSC (Nesting) G5/S3 LA County SBS	<p>MAY FORAGE/FLY OVER PROPERTY DURING MIGRATION & WINTER</p> <p>A rare winter resident found in open areas with few trees, such as annual and non-native grasslands, irrigated pasture, and both estuarine and freshwater emergent wetlands. Known to occur at Ballona Wetlands and the Santa Clara River (Pers. Obs.) during winter. Does not nest in Southern California.</p> <p>The proposed development envelope and fuel modification zone lack suitable habitat elements.</p>

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Athene cunicularia hypagea</i> Western burrowing owl	--	--	SSC (Burrow Sites & Winter Sites) G4/S3 LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Year-round resident throughout much of the state in open dry grassland and desert habitats, and in forb and open shrub stages of pinyon-juniper and ponderosa pine habitats. Breeding season is March to August, but can begin February and extend into December. Usually nests in mammal burrows that they modify. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Strix occidentalis occidentalis</i> California spotted owl	--	--	SSC G3T3/S3 LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE An uncommon, permanent resident in suitable habitat. In southern California, nearly always associated with oak and oak-conifer habitats. Breeding range extends west of the Cascade Range through the North Coast Ranges, the Sierra Nevada, and in more localized areas of the Transverse and Peninsular Ranges. May move downslope in winter along the eastern and western slopes of the Sierra Nevada, and in other areas. Uses dense, multi-layered canopy cover for roost seclusion. Usually nests in tree or snag cavity, or in broken top of large tree. Less frequently nests in large mistletoe clump, abandoned raptor or raven nest, in cave or crevice, on cliff or ground. Does not occur in the Santa Monica Mountains. The proposed development envelope and fuel modification zone lack suitable habitat elements.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Chordeiles acutipennis</i> Lesser nighthawk	--	--	-- G5/SNR LA County SBS (Coastal Slope)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE An uncommon summer resident in arid lowlands, primarily in desert scrub, desert succulent shrub, desert wash, and alkali desert scrub habitats. More common in desert areas of southeastern California. Also forages over grasslands, desert riparian, and other habitats with high densities of flying insects. Nests on the ground typically on alluvial fans characterized by sparse vegetation. Nests have been documented on the Santa Clara River (Per. Obs.), Castaic Creek (Pers. Obs.), San Francisquito Creek (Pers. Obs.), Big Tujunga Wash, San Gabriel River upstream of the Santa Fe Dam, and at San Antonio Wash upstream of Arrow Highway. Casual in winter. Transients sometimes noted on the Channel Islands in spring and summer. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Chaetura vauxi</i> Vaux's swift	--	--	SSC (Nesting) G5/S2S3 --	MAY FORAGE OVER PROPERTY DURING MIGRATION A summer resident of northern California. Breeds fairly commonly in the Coast Ranges from Sonoma Co. north, and very locally south to Santa Cruz Co.; in the Sierra Nevada; and possibly in the Cascade Range. Prefers redwood and Douglas fir habitats with nest-sites in large hollow trees and snags, especially tall, burned-out stubs. Fairly common migrant throughout most of the state in April and May, and August and September. A few winter irregularly in southern coastal lowlands.
<i>Cypseloides niger</i> Black swift	--	--	SSC (Nesting) G4/S2 LA County SBS (Breeding)	MAY FORAGE/FLY OVER PROPERTY DURING MIGRATION Breeds very locally in the Sierra Nevada and Cascade Range, the San Gabriel, San Bernardino, and San Jacinto Mts., and in coastal bluffs and mountains from San Mateo Co. south probably to San Luis Obispo Co. The proposed development envelope and fuel modification zone lack suitable habitat elements.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Calypte costae</i> Costa's hummingbird	--	--	-- (Nesting) G5/S4 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Common in summer and uncommon in winter. Most common and widespread in southern California, but also breeds locally along the western edge of the San Joaquin Valley and the eastern edge of the Sierra Nevada north through Inyo Co. In winter, largely restricted to the southern coast, but also winters on southern deserts. Primary habitats are desert wash, edges of desert riparian and valley foothill riparian, coastal scrub, desert scrub, desert succulent shrub, lower-elevation chaparral, and palm oasis. The proposed development envelope and fuel modification zone consist of marginally suitable habitat elements at best.
<i>Selasphorus rufus</i> Rufous hummingbird	--	--	-- (Nesting) G5/S1S2 --	MAY OCCUR DURING MIGRATION & WINTER A rare, but regular, winter resident in southern California. Found in a wide variety of habitats that provide nectar-producing flowers; uses valley foothill hardwood, valley foothill hardwood-conifer, riparian, and chaparral habitats during migration; montane riparian, aspen, and high mountain meadows to treeline and above.
<i>Selasphorus sasin</i> Allen's hummingbird	--	--	-- (Nesting) G5/S4 --	LOW POTENTIAL IN DEVELOPMENT ENVELOPE – POTENTIAL NEST SITES PRESENT MODERATE POTENTIAL IN FUEL MODIFICATION ZONE - POTENTIAL NEST SITES PRESENT A common summer resident (January to July) and migrant along most of the California coast. Breeders are most common in coastal scrub, valley foothill hardwood, and valley foothill riparian habitats, but also are common in closed-cone pine-cypress, urban, and redwood habitats. Occurs in a variety of woodland and scrub habitats as a migrant. Although mostly coastal in migration, fairly common in southern mountains in summer and fall migration. The proposed development envelope and fuel modification zone consist of suitable habitat elements. Cold Creek is also suitable.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Megasceryle alcyon</i> Belted kingfisher	--	--	-- G5/SNR LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Though widespread throughout North America and readily seen during the winter in Los Angeles County, it is seldom encountered along our local rivers during the breeding season. Because they require earthen riverbanks in which to excavate nest burrows and appear to prefer nest sites that are within close proximity to foraging sites, the loss of unpaved riverbank greatly constrains this species' ability to breed within the county. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Picoides nuttallii</i> Nuttall's woodpecker	--	--	-- (Nesting) G4G5/S4S5 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE A common, permanent resident of low-elevation riparian deciduous and oak habitats. Occurs in the Central Valley, Transverse and Peninsular Ranges, in the Coast Ranges north to Sonoma Co. and rarely to Humboldt Co., and in lower portions of the Cascade Range and Sierra Nevada. Occurs as a vagrant in the Owens Valley. Forages mostly in oak and riparian deciduous habitats. Pecks, probes, drills for sap, and gleans from trunks, branches, twigs and foliage. The proposed development envelope and fuel modification zone lack suitable habitat elements.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Picoides villosus</i> Hairy woodpecker	--	--	-- G5/SNR LA County SBS (Lowland)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Although still a widespread resident in coniferous and mixed oak-conifer forest of the San Gabriel Mountains, occurring at lower elevations along deep, shady canyons (e.g., Arroyo Seco near Pasadena), true lowland populations have been virtually eliminated. This woodpecker once resided year-round in the willow thickets of the Los Angeles Basin nearly to the coast, particularly along major rivers including the Los Angeles and San Gabriel Rivers. A population occurs along the Santa Clara River and major tributaries including San Francisquito, Castaic Creek, and Soledad Canyons (Pers. Obs.). The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Contopus cooperi</i> Olive-sided flycatcher	--	--	-- (Nesting) G4/S4 LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Uncommon to common, summer resident in a wide variety of forest and woodland habitats throughout California exclusive of the deserts, the Central Valley, and other lowland valleys and basins. Preferred nesting habitats include mixed conifer, montane hardwood-conifer, Douglas fir, redwood, red fir, and lodgepole pine. Requires large, tall trees, usually conifers, for nesting and roosting sites; and lofty perches, typically the dead tips or uppermost branches of the tallest trees, for singing posts and hunting perches. The proposed development envelope and fuel modification zone lack suitable habitat elements.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Empidonax wrightii</i> Gray flycatcher	--	--	-- G5/SNR LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Overall uncommon in the county throughout the year, breeding Gray Flycatchers rely on arid, brushy habitat away from urbanized areas. Wintering birds are often found in urban parks and flood-control basins. During the breeding season, confined to a few sites in arid conifer woodlands dominated by pinyons on the north slope of the San Gabriel Mountains. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Empidonax traillii extimus</i> Southwestern willow flycatcher	FE March 1995	SE January 1991	SSC (Nesting) G5T1T2/S1 LA County SBS (Montane & Lowland Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Summer resident. Breeds in dense riparian vegetation near surface water or saturated soil. Riparian patches used vary in size and shape, and may be a relatively dense, linear contiguous stand or an irregularly shaped mosaic with open areas. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Lanius ludovicianus</i> Loggerhead shrike	--	--	SSC (Nesting) G4/S4 LA County SBS (Desert Slope & Coastal Slope Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Found in arid grassland, open savannah, agricultural areas, and both coastal and desert scrub, often near areas of barren soil, including overgrazed land. Requires scattered thorny shrubs for nest placement and for hanging prey. The proposed development envelope and fuel modification zones lack suitable habitat elements.

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	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Vireo vicinior</i> Gray Vireo	--	--	SSC (Nesting) G4/S2 LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE In California it breeds in the Grapevine Mountains of Inyo Co., and in the mountain ranges of the eastern Mojave Desert, the drier northern and eastern slopes of the Transverse Ranges, the San Jacinto Mountains, and on the southern slopes of the Laguna Mountains. Breeding birds arrive in California from late March to early May. Most depart the United States in winter but occur in small numbers in southern Arizona and western Texas. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Vireo bellii pusillus</i> Least Bell's vireo	FE May 1986	SE October 1980	SSC (Nesting) G5T2/S2 LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Frequents riparian habitats and require dense thickets of willow and other low shrubs for nesting. The dense riparian thickets they occupy are usually impenetrable, with ground cover in the shrub layer being nearly 100%. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Eremophila alpestris actia</i> California horned lark	--	--	WL G5T3Q/S3 LA County SBS (Coastal Slope)	LOW POTENTIAL IN DEVELOPMENT ENVELOPE LOW POTENTIAL IN FUEL MODIFICATION ZONE Frequents grasslands and other open habitats with low, sparse vegetation. The proposed development envelope and fuel modification zone consist of suitable habitat elements at best. It is unlikely that this species would nest at the site given its proximity to existing single-family residences. The biologists did not observe the species during the site visits.

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	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Progne subis arboricola</i> Purple martin	--	--	SSC (Nesting) G5/S3 LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE An uncommon to rare, local summer resident in a variety of wooded, low-elevation habitats throughout the state; a rare migrant in spring and fall, absent in winter. Uses valley foothill and montane hardwood, valley foothill and montane hardwood-conifer, and riparian habitats. Also occurs in coniferous habitats, including closed-cone pine-cypress, ponderosa pine, Douglas fir, and redwood. . The property consists of elements suitable for the occurrence of this species; however, in southern California it is now only a rare and local breeder on the coast and in interior mountain ranges. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Riparia riparia</i> Bank swallow	--	SE June 1989	-- (Nesting) G5/S2S3 LA County SBS (Breeding)	MAY FORAGE OVER PROPERTY DURING MIGRATION Restricted to riparian habitats during summer and open habitats during migration. Requires vertical banks, bluffs, or cliffs with fine-textured or sandy soils for nesting. It nests along a small section of the Sacramento and Feather rivers and other isolated areas. Species not known to nest in the region.
<i>Baeolophus inornatus</i> Oak titmouse	--	--	-- (Nesting) G4/S4 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE A common resident in a variety of habitats, but primarily associated with oaks. Occurs in montane hardwood-conifer, montane hardwood, blue, valley, and coastal oak woodlands, and montane and valley foothill riparian habitats in cismontane California, from the Mexican border to Humboldt County. The proposed development envelope and fuel modification zone lack suitable habitat elements.

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	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Campylorhynchus brunneicapillus sandiegensis</i> Coastal cactus wren	--	--	SSC (San Diego & Orange counties) G5T3Q/S3 LA County SBS (Coastal Slope)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Coastal race found in arid parts of westward-draining slopes of southern California; numbers reduced in recent decades. Frequents desert succulent shrub, Joshua tree, and desert wash habitats. Nest usually built in cholla or other large, branching cactus, in yucca, or in stiff-twigged, thorny shrub or small tree. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Cistothorus palustris clarkae</i> Marsh wren	--	--	SSC G5T2T3/S2S3 LA County SBS (Interior Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE A yearlong resident along northern and central coast, in the Central Valley, and in scattered locations in transmontane California. Migrants and winter residents may occur in any low vegetation growing in water or on damp ground. Breeding is restricted to cattails, bulrushes, sedges, and other vegetation in emergent wetland habitat. In southern California, breeds mainly in Imperial and Colorado River valleys, locally along the coast, and in a few desert wetlands. In the county it breeds primarily in the Antelope Valley at Piute Ponds, at Lake Palmdale, and Elizabeth Lake. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Poliophtila californica</i> California gnatcatcher	FT March 1993	--	SSC G3T2/S2 LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Obligate resident of arid coastal scrub. California buckwheat, coastal sage, and patches of prickly pear cactus are favored. The proposed development envelope and fuel modification zone lack suitable habitat elements.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Sialia currucoides</i> Mountain bluebird	--	--	-- G5/SNR LA County SBS (Wintering)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Always occurring almost exclusively as a wintering bird in the county, small flocks once wintered on the coastal plain, though in varying numbers year to year. Currently, the species is extremely rare on the coastal slope, and birds are confined to remote expanses of grassland and irrigated pastureland on the floor in the Antelope Valley, approaching the northern slope of the Transverse Range (Sierra Pelona) near Gorman. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Catharus ustulatus</i> Swainson's thrush	--	--	-- G5/SNR LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE West coast populations primarily occupy riparian woodlands, and our county birds were historically concentrated in willow-alder riparian thickets in the lowlands. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Setophaga petechia</i> Yellow warbler	--	--	SSC G5/S3S4 LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs as a migrant and summer resident from late March through early October; breeds from April to late July in riparian woodlands from coastal and desert lowlands up to 2500 m in Sierra Nevada. Also breeds in montane chaparral, and in open ponderosa pine and mixed conifer habitats with substantial amounts of brush. The proposed development envelope and fuel modification zone lack suitable habitat elements. Cold Creek consists of marginally suitable habitat.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Cardellina pusilla</i> Wilson's warbler	--	--	-- G5/SNRB LA County SBS (Montane & Lowland Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE The county's montane-breeding population occupies riparian areas dominated by low willows and other shrubs, often within steep ravines on north-facing slopes. There are few historical records from our local mountains (egg sets are mostly from the basin). The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Icteria virens</i> Yellow-breasted chat	--	--	SSC G5/S3 LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs as a migrant and in summer primarily from late March to late September in coastal California and in foothills of the Sierra Nevada. Frequents dense, brushy thickets and tangles near water, and thick understory in riparian woodland. In migration, may be found in lower elevations of mountains in riparian habitat. Breeds late April through early August. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Aimophila ruficeps canescens</i> Southern California rufous-crowned sparrow	--	--	WL G5T3/S2S3 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Mixed chaparral and coastal scrub. Frequents relatively steep, often rocky hillsides with grass and forb patches; also grassy slopes without shrubs, if rock outcrops are present. The proposed development envelope and fuel modification zone lack suitable habitat elements.

<i>SCIENTIFIC NAME</i> COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Spizella passerina</i> Chipping sparrow	--	--	-- (Nesting) G5/S4S5 --	MAY FORAGE AT PROPERTY A common migrant and summer visitor throughout most of California, excluding Central Valley, southern deserts, and alpine areas. Winters less commonly in Central Valley and southern California lowlands. Prefers open wooded habitats with a sparse or low herbaceous layer and few shrubs, if any. Although apparently requires trees for resting and singing, and prefers trees for nesting, often forages in nearby herbaceous and open shrub habitats, including dry margins of wet meadows. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Spizella breweri</i> Brewer's sparrow	--	--	-- (Nesting) G5/S4 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE A common summer resident and breeder east of the Cascade-Sierra Nevada crest, in mountains and higher valleys of Mojave Desert, and the southern end of the San Joaquin Valley. Breeds in treeless shrub habitats with moderate canopy, especially in sagebrush. Now mostly absent from former breeding grounds in southwestern California. Common in winter in open desert scrub and cropland habitats of southern Mojave and Colorado deserts, usually in areas with some herbaceous understory. Occurs as a rare fall transient west of Sierra Nevada, and as an uncommon fall transient and rare spring transient in southern coastal districts. The proposed development envelope and fuel modification zone lack suitable habitat elements.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Artemisospiza belli belli</i> Bell's sage sparrow	--	--	WL G5T2T4/S2? --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs on coastal slopes and part of the western slope of the sierra Nevada south into Baja California in chaparral dominated by chamise and coastal scrub dominated by sage. Breeds in fairly dense chaparral and desert scrub. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Chondestes grammacus</i> Lark sparrow	--	--	-- (Nesting) G5/S4S5 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE A common to fairly common resident in lowlands and foothills throughout much of California. Frequents sparse valley foothill hardwood, valley foothill hardwood-conifer, open mixed chaparral and similar brushy habitats, and grasslands with scattered trees or shrubs. In woodlands, prefers younger stages and hardwoods (mostly oaks) rather than conifers. Nests on the ground. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Passerculus sandwichensis beldingi</i> Belding's savannah sparrow	--	SE January 1974	-- G5T3/S3 LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs year-round in salt marsh usually in the upper littoral zone. It nests in dense pickleweed. The proposed development envelope and fuel modification zone lack suitable habitat elements.

<i>SCIENTIFIC NAME</i> COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Ammodramus savannarum</i> Grasshopper sparrow	--	--	SSC (Nesting) G5/S2 LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs nearly year-round in extensive, dense grasslands, especially those with a variety of grasses and tall forbs and scattered low shrubs for singing perches. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Melospiza lincolnii</i> Lincoln's sparrow	--	--	-- G5/SNR LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Nests only in damp mountain meadows that support tall grasses, sedge, and corn lilies interspersed with low-growing shrubs such as willow. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Piranga flava hepatica</i> Hepatic tanager	--	--	WL (Nesting) G5/S1 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Rare migrant in lowlands of southern California and rare in winter. Species does not nest in the region.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Piranga rubra cooperi</i> Summer tanager	--	--	SSC (Nesting) G5/S1 LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE An uncommon summer resident in desert riparian habitat along the lower Colorado River; very locally elsewhere in southern California deserts. Found in other localities in migration. Breeds in mature, desert riparian habitat dominated by cottonwoods and willows. Arrives on summer breeding grounds in April and usually departs by September. Transients occur elsewhere in interior mostly in May and June and September into November. Occurs along coast rarely but regularly from September to March and May to June. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Sturnella neglecta</i> Western meadowlark	--	--	-- G5/SNR LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Once abundant in Los Angeles County's lowlands but now can only commonly be found in agricultural land and other open habitats in the Antelope Valley. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Agelaius tricolor</i> Tricolored blackbird	--	SE Emergency December 2013 Expired December 2014	SSC (Nesting Colony) G2G3/S1S2 LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Feeds in grassland and cropland habitats and breeds near fresh water in emergent wetland with tall, dense cattails or tules, but also in thickets of willow, blackberry, wild rose, and tall herbs March through November. The proposed development envelope and fuel modification zone lack suitable habitat elements.

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁵
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Xanthocephalus xanthocephalus</i> Yellow-headed blackbird	--	--	SSC (Nesting) G5/S3 LA County SBS	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Breeds commonly, but locally, east of Cascade Range and Sierra Nevada, in Imperial and Colorado River valleys, in the Central Valley, and at selected locations in the coast ranges west of the Central Valley. Occurs as a migrant and local breeder in deserts and along the Orange county coast. Nests in fresh emergent wetland with dense vegetation and deep water, often along borders of lakes or ponds. Forages in emergent wetland and moist, open areas, especially cropland and muddy shores of lacustrine habitat. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Icterus parisorum</i> Scott's oriole	--	--	-- G5/SNR LA County SBS (Breeding)	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Throughout the southwest, favors arid slopes and highlands supporting larger plants such as Joshua trees, mesquite-acacia associations, pinyon-juniper woodland, and dry oak woodland. It will breed in oases with larger trees, but is absent from areas of low desert scrub. The large territories typical of this species further constrain the breeding locales available. County breeders are concentrated in a few tracts of extensive Joshua tree woodland in the eastern Antelope Valley and patches of pinyon-juniper woodland on the north flank of the San Gabriel Mountains. The proposed development envelope and fuel modification zone lack suitable habitat elements.

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	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Spinus lawrencei</i> Lawrence's goldfinch	--	--	-- (Nesting) G3G4/S3 --	<p>NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE</p> <p>Occurs April through September in valley foothill hardwood, valley foothill hardwood-conifer, desert riparian, palm oasis, pinyon-juniper, and lower montane habitats. Breeds in open oak or other arid woodland and chaparral, near water but rarely along immediate coast.</p> <p>The proposed development envelope and fuel modification zone lack suitable habitat elements. Cold Creek consists of habitat suitable for this species.</p>

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MAMMALS				
<i>Sorex ornatus salicornicus</i> Southern California saltmarsh shrew	--	--	SSC G5T1?/S1 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE The Southern California salt marsh shrew is confined to coastal salt marshes in Los Angeles, Orange, and Ventura counties. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Macrotus californicus</i> California leaf-nosed bat	--	--	SSC G4/S2S3 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL ROOST SITES ABSENT NOT EXPECTED IN FUEL MODIFICATION ZONE - POTENTIAL ROOST SITES ABSENT Preferred habitats are caves, mines, and rock shelters, mostly in Sonoran desert scrub. It does not hibernate. Winter roosts are geothermally heated. Mating takes place in the fall. Pups born June. The proposed development envelope and fuel modification zone lack suitable habitat elements, specifically it lacks potential roost sites.

⁶ *Habitat Notes are taken from California Department of Fish and Wildlife. California Interagency Wildlife Task Group. 2005. California Wildlife Habitat Relationships, Sacramento, California.*
Exhibit I - Regional Special-Status Wildlife Species

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁶
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Antrozous pallidus</i> Pallid bat	--	--	SSC G5/S3 --	<p>NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL ROOST SITES ABSENT</p> <p>NOT EXPECTED IN FUEL MODIFICATION ZONE - POTENTIAL ROOST SITES ABSENT</p> <p>Throughout California except high Sierra Nevada. Habitat includes grassland, shrubland, woodland, and conifer forests. Most common in open, dry habitats with rocky areas for roosting. Roosts in caves, crevices, mines, under bridges, bird and bat boxes, and occasionally hollow trees and buildings. Non-migratory. Birth occurs late June, nursing continues into August.</p> <p>The proposed development envelope and fuel modification zone lack suitable habitat elements, specifically it lacks potential roost sites.</p>
<i>Euderma maculatum</i> Spotted bat	--	--	SSC G4/S2S3 --	<p>NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL ROOST SITES ABSENT</p> <p>NOT EXPECTED IN FUEL MODIFICATION ZONE - POTENTIAL ROOST SITES ABSENT</p> <p>Occupied habitats include arid deserts, grasslands, and mixed conifer forests. Prefers sites with adequate roosting habitat, such as cliffs. Feeds over water and along washes. Pups are born late May to early June, nursing continues into August.</p> <p>The proposed development envelope and fuel modification zone lack suitable habitat elements, specifically it lacks potential roost sites.</p>

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	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Lasionycteris noctivagans</i> Silver-haired bat	--	--	-- G5/S3S4 --	<p>NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL ROOST SITES ABSENT</p> <p>NOT EXPECTED IN FUEL MODIFICATION ZONE - POTENTIAL ROOST SITES ABSENT</p> <p>In southern California from Ventura and San Bernardino Cos. south to Mexico and on some of the Channel Islands. Summer habitats include coastal and montane coniferous forests, valley foothill woodlands, pinyon-juniper woodlands, and valley foothill and montane riparian habitats. Roosts in hollow trees, snags, buildings, rock crevices, caves, and under bark.</p> <p>The proposed development envelope and fuel modification zone lack suitable habitat elements, specifically it lacks potential roost sites.</p>
<i>Lasiurus blossevillii</i> Western red bat	--	--	SSC G5/S3? --	<p>NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL ROOST SITES ABSENT</p> <p>NOT EXPECTED IN FUEL MODIFICATION ZONE - POTENTIAL ROOST SITES ABSENT</p> <p>Occurs from Shasta Co. south to Mexico, west of Sierra Nevada/Cascade crest and deserts. Feeds over scrublands, grasslands, open woodlands, and croplands. Roosts in foliage of forest and woodland trees. Pups born June. Nursing into August. Migrates to south of range to hibernate.</p> <p>The proposed development envelope and fuel modification zone lack suitable habitat elements, specifically it lacks potential roost sites.</p>

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁶
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Myotis ciliolabrum</i> Western small-footed myotis	--	--	-- G5/S3 --	<p>NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL ROOST SITES ABSENT</p> <p>NOT EXPECTED IN FUEL MODIFICATION ZONE - POTENTIAL ROOST SITES ABSENT</p> <p>Occurs from Contra Costa County south to the Mexico and west and east of the Sierra Nevada and in Great Basin and desert habitats from Modoc to San Bernardino counties in a wide variety of habitats, primarily wooded and brushy uplands near water. Roosts in caves, buildings, mines, crevices, and occasionally under bridges and bark.</p> <p>The proposed development envelope and fuel modification zone lack suitable habitat elements, specifically it lacks potential roost sites.</p>
<i>Myotis evotis</i> Long-eared myotis	--	--	-- G5/S3 --	<p>NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL ROOST SITES ABSENT</p> <p>NOT EXPECTED IN FUEL MODIFICATION ZONE - POTENTIAL ROOST SITES ABSENT</p> <p>Widespread but generally uncommon. Occurs along the coast and in the Sierra Nevada, Cascades, and Great Basin from the Oregon border south through the Tehachapi Mts. to the Coast Ranges. Coniferous woodlands and forests preferred but also brush habitats. Roosts in caves, buildings, snags, crevices, and under bark.</p> <p>The proposed development envelope and fuel modification zone lack suitable habitat elements, specifically it lacks potential roost sites.</p>

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	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Myotis thysanodes</i> Fringed myotis	--	--	-- G4/S3 --	<p>NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL ROOST SITES ABSENT</p> <p>NOT EXPECTED IN FUEL MODIFICATION ZONE - POTENTIAL ROOST SITES ABSENT</p> <p>In California, occurs in all but the Central Valley and Colorado and Mojave deserts. It occurs in a wide variety of habitats. Optimal habitats are pinyon-juniper, valley foothill hardwood and hardwood-conifer. Roosts in caves, mines, buildings, and crevices.</p> <p>The proposed development envelope and fuel modification zone lack suitable habitat elements, specifically it lacks potential roost sites.</p>
<i>Myotis volans</i> Long-legged myotis	--	--	-- G5/S3 --	<p>NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL ROOST SITES ABSENT</p> <p>NOT EXPECTED IN FUEL MODIFICATION ZONE - POTENTIAL ROOST SITES ABSENT</p> <p>It is absent only from the Central Valley, the Colorado and Mojave deserts (except in mountain ranges), and from eastern Lassen and Modoc cos. Forages in chaparral, coastal scrub, Great Basin shrub, and early successional stages of woodlands and forests. Roosts in rock crevices, buildings, under bark, in snags, mines, and caves. Maternity sites under bark or in hollow trees, but occasionally crevices or buildings.</p> <p>The proposed development envelope and fuel modification zone lack suitable habitat elements, specifically it lacks potential roost sites.</p>

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁶
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Corynorhinus townsendii</i> Townsend's big-eared bat	--	SC December 2013	SSC G3G4/S2S3 --	<p>NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL ROOST SITES ABSENT</p> <p>NOT EXPECTED IN FUEL MODIFICATION ZONE - POTENTIAL ROOST SITES ABSENT</p> <p>Found throughout California except subalpine and alpine habitats. Roosts in caves, mines, tunnels, buildings, and other human-made structures. Prefers mesic habitats where it gleans vegetation or captures moths and beetles in flight. Pups are born in May or June, nursing continues into August.</p> <p>The proposed development envelope and fuel modification zone lack suitable habitat elements, specifically it lacks potential roost sites.</p>
<i>Eumops perotis californicus</i> Greater bonneted bat	--	--	SSC G5T4/S3? --	<p>NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL ROOST SITES ABSENT</p> <p>NOT EXPECTED IN FUEL MODIFICATION ZONE - POTENTIAL ROOST SITES ABSENT</p> <p>Prefers open arid areas. Crevices, high buildings, trees, and tunnels required for roosting and maternal sites. Pups are born late June through September, nursing continues into early November. Does not migrate or hibernate.</p> <p>The proposed development envelope and fuel modification zone lack suitable habitat elements, specifically it lacks potential roost sites.</p>

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁶
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Nyctinomops femorosaccus</i> Pocketed free-tailed bat	--	--	SSC G4/S3 --	<p>NOT EXPECTED IN DEVELOPMENT ENVELOPE - POTENTIAL ROOST SITES ABSENT</p> <p>NOT EXPECTED IN FUEL MODIFICATION ZONE - POTENTIAL ROOST SITES ABSENT</p> <p>Rare in California. Prefers rocky desert areas with high cliffs or rock outcrops. Habitats used include pinyon-juniper woodlands, desert scrub, desert succulent shrub, desert riparian, desert wash, alkali desert scrub, Joshua tree, and palm oasis. Prefers rock crevices in cliffs as roosting sites. Maternity sites include rock crevices, caverns, or buildings. Pup usually born early July.</p> <p>The proposed development envelope and fuel modification zone lack suitable habitat elements, specifically it lacks potential roost sites.</p>
<i>Bassariscus astutus</i> Ringtail	--	--	FP G5/S3S4 --	<p>NOT EXPECTED IN DEVELOPMENT ENVELOPE - DEN SITES ABSENT</p> <p>NOT EXPECTED IN FUEL MODIFICATION ZONE - DEN SITES ABSENT</p> <p>Ideal habitat consists a mix of forest and shrub land associated with rocky or riparian habitats. Its principal habitat requirements seem to be den sites among boulders or in hollows of trees with sufficient food in the form of rodents and other small animals. The biologist did not observe any potential den sites during the site visit.</p> <p>The proposed development envelope and the fuel modification zone lack suitable habitat elements. .</p>

SCIENTIFIC NAME COMMON NAME	STATUS (September 2017)			POTENTIAL FOR OCCURRENCE, HABITAT NOTES, & LIFE HISTORY ⁶
	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Taxidea taxus</i> American badger	--	--	SSC G5/S4 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE - DEN SITES ABSENT NOT EXPECTED IN FUEL MODIFICATION ZONE - DEN SITES ABSENT Prefers dry open stages of most shrub, forest, and herbaceous habitats, with friable soils. The proposed development envelope and fuel modification zone lack suitable habitat elements. The biologist did not observe any badgers or large burrows during the site visit.
<i>Perognathus longimembris brevinasus</i> Los Angeles pocket mouse	--	--	SSC G5T1T2/S1S2 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Occurs in lower elevation grassland, alluvial sage scrub, and coastal sage scrub. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Neotoma lepida intermedia</i> San Diego desert woodrat	--	--	SSC G5T3?/S3? --	NOT EXPECTED IN DEVELOPMENT ENVELOPE - WOODRAT HOUSES ABSENT NOT EXPECTED IN FUEL MODIFICATION ZONE - WOODRAT HOUSES ABSENT Joshua tree, pinyon-juniper, mixed and chamise-redshank chaparral, sagebrush, and most desert habitats with rocky outcrops and substrates. Houses are constructed with twigs, sticks, cactus parts, and rocks, and are used for nesting, food caching, and predator escape. The proposed development envelope lack suitable habitat elements. The plant communities associated with the drainage appear suitable; however, the biologist did not observe any woodrat houses during the site visit.

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	Federal Status	State Status	CDFW (Season) Global Rank/State Rank LA County (Season/Region)	
<i>Microtus californicus stephensi</i> South coast marsh vole	--	--	SSC G5T1T2/S1S2 --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE This subspecies occurs from Santa Barbara County south to Orange County in coastal salt marshes dominated by pickleweed. The proposed development envelope and fuel modification zone lack suitable habitat elements.
<i>Lepus californicus bennetti</i> San Diego black-tailed jackrabbit	--	--	SSC G5T3?/S3? --	NOT EXPECTED IN DEVELOPMENT ENVELOPE NOT EXPECTED IN FUEL MODIFICATION ZONE Abundant at lower elevations in herbaceous and desert-shrub areas and open, early stages of forest and chaparral habitats. The proposed development envelope and fuel modification zone lack suitable habitat elements. The biologists did not observe the species or any of its scat during the site visits.

Status Key:

Federal		State		California Department of Fish and Wildlife	
FE:	Federally Endangered	SE:	State Endangered	FP:	Fully Protected
FT:	Federally Threatened	ST:	State Threatened	SSC:	Species of Special Concern
FC:	Federal Candidate	SC:	State Candidate	WL:	Watch List

Potential for Occurrence: Based on professional experience, knowledge of habitat associations, and known occurrences in the region.

Present = Detected during site visit, known to occur, or recently reported to occur

Expected = Suitable habitat is present and species known to occur in the immediate vicinity

High Potential = Suitable habitat is present and species is known to occur frequently in the region

Moderate Potential = Suitable habitat is limited and species occurs in the region infrequently

Low Potential = Species-specific survey negative or marginal habitat is present or temporary in nature and species known to occur in the immediate vicinity (potential for occurrence cannot be ruled out)

Not Expected = Suitable habitat is absent or species is not expected to occur during the "season of concern"

The official federal listing of Endangered and Threatened animals is published in the Federal Register, 50 CFR 17.11. The official state Endangered and Threatened animals list is contained in the California Code of Regulations, Title 14, Section 670.5. A state candidate species is one that the Fish and Game commission had formally noticed as being under review by the Department for addition to the State list. A federal candidate species is one for which a proposed regulation has been published in the Federal Register.

Fully Protected: This classification was the State's initial effort to identify and provide additional protection to those animals that were rare or faced possible extinction. Most of the species on these lists have subsequently been listed under the state and/or federal endangered species acts; white-tailed kite, golden eagle, trumpeter swan, northern elephant seal and ring-tailed cat are the exceptions. The white-tailed kite and the golden eagle are tracked in the CNDDB; the trumpeter swan, northern elephant seal and ringtail cat are not. The Fish and Game Code sections dealing with Fully Protected species state that these species "may not be taken or possessed at any time and no provision of this code or any other law shall be construed to authorize the issuance of permits or licenses to take any fully protected" species, although take may be authorized for necessary scientific research. This language arguably makes the "Fully Protected" designation the strongest and most restrictive regarding the "take" of these species. In 2003 the code sections dealing with fully protected species were amended to allow the Department to authorize take resulting from recovery activities for state-listed species. More information on Fully Protected species and the take provisions can be found in the Fish and Game Code, (birds at §3511, mammals at §4700, reptiles and amphibians at §5050, and fish at §5515). Additional information on Fully Protected fish can be found in the California Code of Regulations, Title 14, Division 1, Subdivision 1, Chapter 2, Article 4, §5.93. The category of Protected Amphibians and Reptiles in Title 14 has been repealed.

California Species of Special Concern: It is the goal and responsibility of the Department of Fish and Wildlife to maintain viable populations of all native species. To this end, the Department has designated certain vertebrate species as "Species of Special Concern" because declining population levels, limited ranges, and/or continuing threats have made them vulnerable to extinction. The goal of designating species as "Species of Special Concern" is to halt or reverse their decline by calling attention to their plight and addressing the issues of concern early enough to secure their long term viability. Not all "Species of Special Concern" have declined equally; some species may be just starting to decline, while others may have already reached the point where they meet the criteria for listing as a "Threatened" or "Endangered" species under the State and/or Federal Endangered Species Acts.

Global Rank (G Rank) is a reflection of the overall status of an element throughout its global range. Both Global and State ranks represent a letter and number score that reflects a combination of Rarity, Threat, and Trend factors, with weighting being heavier on Rarity than the other two. Taxa that are subspecies or varieties receive a taxon rank (T-rank) attached to their G-rank. Where the G-rank reflects the condition of the entire species, the T-rank reflects the global situation of just the subspecies.

GQ = Questionable Taxonomy - Denotes an element that is very rare, but there are taxonomic questions associated with it.

GX = Presumed Extinct - Species not located despite intensive searches and virtually no likelihood of rediscovery. Ecological community or system eliminated throughout its range, with no restoration potential.

GH = Possibly Extinct - Known from only historical occurrences but some hope of rediscovery. Evidence exists that species may be extinct or ecosystem eliminated throughout its range, but not enough to state this with certainty.

G1 = Critically Imperiled - At very high risk of extinction due to extreme rarity (often 5 or fewer populations), very steep declines, or other factors.

G2 = Imperiled - At high risk of extinction due to very restricted range, very few populations (often 20 or fewer), steep declines, or other factors.

G3 = Vulnerable - At moderate risk of extinction due to a restricted range, relatively few populations (often 80 or fewer), recent and widespread declines, or other factors.

G4 = Apparently Secure - Uncommon but not rare; some cause for long-term concern due to declines or other factors.

G5 = Secure - Common; widespread and abundant.

G? = Inexact Numeric Rank

GU = Unrankable

Exhibit I - Regional Special-Status Wildlife Species

GNR = Unranked
GNA = Not Applicable
C = Captive or Cultivated Only

State Rank (S Rank) is assigned much the same way as the global rank, but state ranks refer to the imperilment status only within California's state boundaries.

SQ = Questionable Taxonomy - Denotes an element that is very rare, but there are taxonomic questions associated with it.

SX = Presumed Extirpated

SH = Possibly Extirpated

S1 = Critically Imperiled - Critically imperiled in the state because of extreme rarity (often 5 or fewer populations) or because of factor(s) such as very steep declines making it especially vulnerable to extirpation from the state.

S2 = Imperiled - Imperiled in the state because of rarity due to very restricted range, very few populations (often 20 or fewer), steep declines, or other factors making it very vulnerable to extirpation from the state.

S3 = Vulnerable - Vulnerable in the state due to a restricted range, relatively few populations (often 80 or fewer) recent and widespread declines, or other factors making it vulnerable to extirpation from the state.

S4 = Apparently Secure - Uncommon but not rare in the state; some cause for long-term concern due to declines or other factors.

S5 = Secure- Common, widespread, and abundant in the state.

S? = Inexact Numeric Rank

SU = Unrankable

SNR = Unranked

SNA = Not Applicable

LA County SBS = Los Angeles County Sensitive Bird Species (Season/Region of concern)

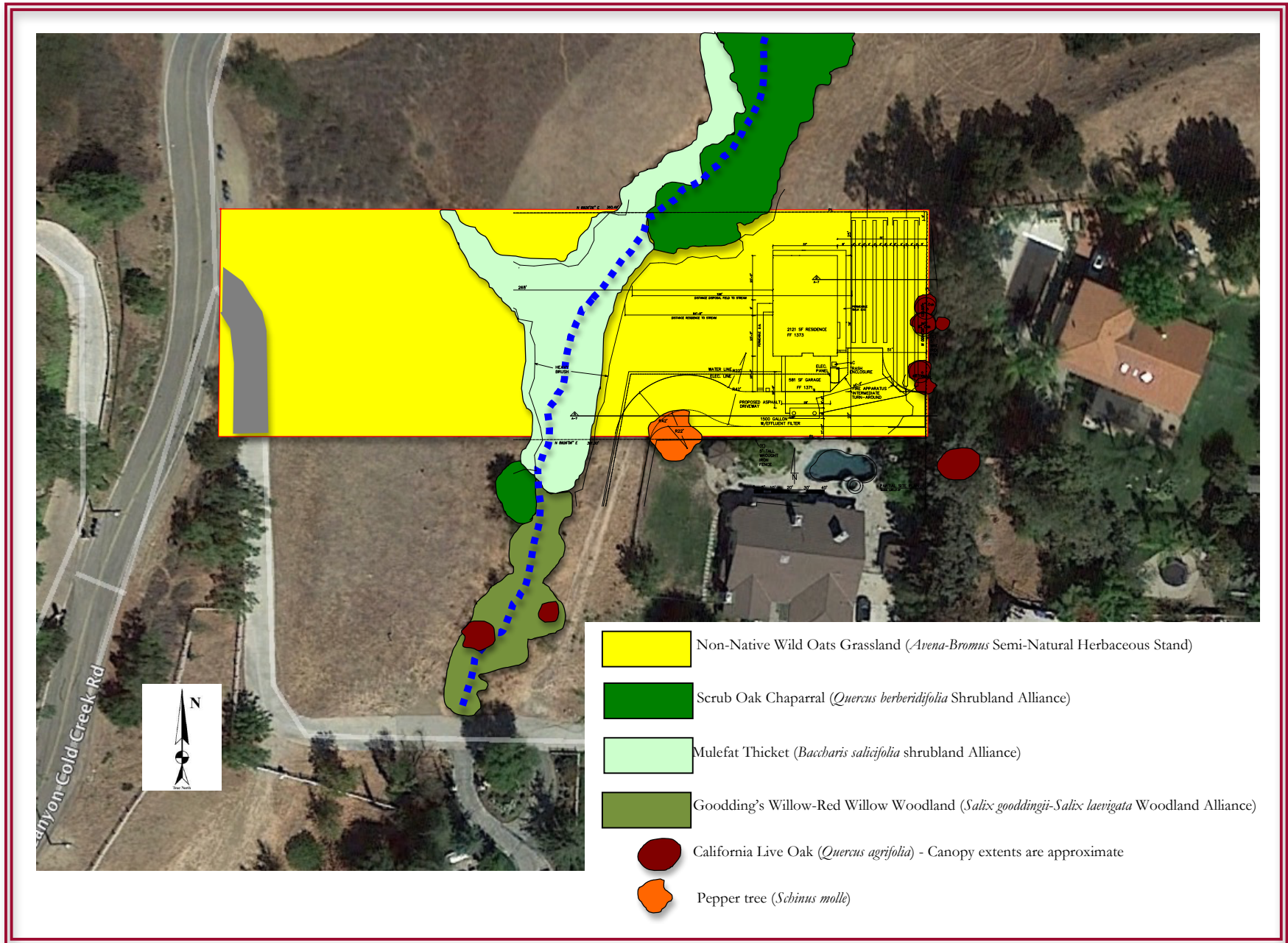


Exhibit J - Natural Resources Map w/ Site Plan Overlay

Andrew Forde

Wildlife Biologist

Mr. Forde has a research degree in wildlife biology read for at the University of St Andrews, Scotland and has a higher national certificate in biology read for at Stow College, Scotland. He has more than 14 years consulting experience in southern California primarily as a wildlife biologist. He has participated in research projects with the United States Geological Service, United States Fish and Wildlife Service, and California Department of Fish and Wildlife (CDFW), and has worked at University of California, Davis, Raptor Center. He has conducted countless surveys for special-status, threatened, and endangered species, written numerous biological reports and assessments, prepared and reviewed sections for CEQA documents, edited scientific papers for the United States Geological Survey, and has written communications for press release. He has also conducted botanical surveys, delineated wetlands, prepared reports, Section 404 and 401 applications, and Section 1600 Streambed Alteration Agreements.

He has held permits authorizing take of more than 10 threatened and endangered species. His current 10(a)(1)(A) Federal Fish and Wildlife Permit, TE-062907-8, authorizes take of quino checkerspot butterfly, southwestern willow flycatcher, least Bells vireo, and California gnatcatcher throughout their range. Federal Bird Marking Permit 23529 authorizes capture, banding, and marking of willow flycatcher. CDFW Memorandum of Understanding (MOU) 3-6-2012 and Scientific Collectors Permit (SCP) SCP-3750 authorize the above activities and authorization to take willow flycatcher and trap and sacrifice brown-headed cowbirds for the purpose of enhancing the survival of threatened and endangered species. CDFW SCP-3750 also authorizes survey and capture of invertebrates, reptiles, amphibians, birds, and mammals using a variety of techniques, including pitfall. CDFW MOU also authorizes capture of bats using mist nets, hand-held nets, and harp traps. He also uses acoustical equipment and sophisticated software to identify bats.



Education

Bachelor of Science, Honors, Biology, St Andrews University, Scotland, 1997

Higher National Certificate, Biology, Stow College, Scotland, 1993

Permits

10(a)(1)(A) Federal Fish and Wildlife Permit, TE-062907-6, authorizes take of quino checkerspot, southwestern willow flycatcher, least Bells vireo, and California gnatcatcher throughout their ranges.

CDFW Memoranda of Understanding, dated March 2012, authorizes take of willow flycatcher, least Bells vireo, and California gnatcatcher throughout the state.

Federal Bird Marking Permit, 23529, authorizes capture, banding, and marking of southwestern willow flycatcher.

CDFW Memoranda of Understanding, dated March 2012, authorizes take of bats throughout California.

CDFW Memorandum of Understanding, dated March 2012, authorizes trapping and sacrifice of brown-headed cowbirds.

CDFW Scientific Collectors Permit, SCP-3750, authorizes activities listed in the above permits and MOU and includes authorizations to survey and capture invertebrates, reptiles, amphibians, and mammals for the purpose of identification.

Special Training

Flat-tailed Horned Lizard, Bureau of Land Management, 2014

Bat Capture & Handling, National Trust Scotland, August 2012

Bat Ecology, Survey Techniques, & Guidelines, National Trust Scotland, August 2012

Yellow-Billed Cuckoo, Southern Sierra Research Station, June 2012

Bat Conservation and Management, Bat Conservation International, May 2012

Raptor Research Conference (Scotland), Raptor Research Foundation, October 2009

Bat Ecology & Identification, The Wildlife Society, August 2004

Bat Ecology, Identification, & ANABAT, Michael O'Farrell & Chris Corben, June 2004

Ecology of Vernal Pool Grasslands, University of California, Davis, 2004

Southwestern Willow Flycatcher, The Southern Sierra Research Group, May 2004

Sensitive Butterflies of San Diego County, Faulkner & Klein, 2003

California Branchiopod, Mary Belk, 2003

Sensitive Reptiles & Amphibians, The Wildlife Society, 2003

Invertebrates

Mr. Forde has held permits authorizing take of at least 8 threatened and endangered invertebrates. His primary focus is butterflies. He has attended workshops hosted by the San Diego Natural History Museum and by Faulkner and Klein, studied specimens at museums, and has taken and passed the US Fish and Wildlife Service quino checkerspot butterfly exam on all three occasions that he has taken it. The exam requires the taker to be able to identify approximately 40 species of co-occurring butterfly. He has also passed the services branchiopod exam on multiple occasions, which requires the taker to be able to identify all 27 species that occur in California. He has conducted surveys for threatened and endangered invertebrates in San Diego, Riverside, San Bernardino, and Ventura counties, and has assisted the USFWS in support of their long-term monitoring efforts of endangered and threatened species.

Reptiles & Amphibians

Mr. Forde has attended several workshops that focused upon ecology, life history, and distribution of reptiles and amphibians. His SCP authorizes take of numerous reptiles and amphibians for the purpose of identification. He has conducted surveys for reptiles in Imperial, San Diego, Orange, Riverside, San Bernardino, Ventura, Los Angeles, Santa Barbara, Kern, and other counties. He has detected numerous special-status species during these surveys including southwestern pond turtle, San Diegan tiger whiptail (100s of individuals), southern California legless lizard (100 of individuals), coast-horned lizard, San Bernardino ringneck snake, San Diego Mountain kingsnake, two-striped garter snake, south coast garter snake, western spadefoot, arroyo toad, and California red-legged frog.

Birds

Mr. Forde's Federal Fish and Wildlife Permit, CDFW MOU, and SCP authorize take (survey, locate nests, monitor nests, and remove brown-headed cowbird eggs and chicks from parasitized nests) of southwestern willow flycatcher, least Bell's vireo, and California gnatcatcher. Federal Bird Marking Permit, 23259, authorizes him to capture, band, and mark southwestern willow flycatcher. He has conducted surveys for flycatcher on Castaic Creek, Santa Clara River, San Francisquito Creek, San Gabriel River, Santa Ana River, Rio Hondo, Whittier Narrows, Salinas River,

Lower Colorado River, the Bill Williams River, the Gila River, the All American Canal, Imperial National Wildlife Area, Mittry Lake Wildlife Area, Bill Williams River National Wildlife Refuge, and Havasu National Wildlife Refuge among numerous smaller rivers, creeks, and wetlands. He has monitored their nests to determine reproductive success and collect other pertinent data and has captured individuals using calls and mist nets for the purpose of banding them, and collecting blood and feather samples for DNA analysis. He has conducted surveys for least Bell's vireo on Castaic Creek, the Santa Clara River, San Francisquito Creek, San Gabriel River, Santa Ana River, Rio Hondo, Whittier Narrows, and Salinas River among numerous smaller rivers and creeks. He has conducted surveys for California gnatcatcher throughout San Diego, Orange, Riverside, San Bernardino, Ventura, and Los Angeles counties. He has found at least one nest in every territory established by these species in the areas that he has surveyed. His SCP also authorizes take (survey, locate nests, monitor nests) of burrowing owl. He has conducted surveys for burrowing owl in Imperial, San Diego, Orange, Riverside, San Bernardino, Ventura, and Los Angeles counties. He has observed hundreds of individuals and nest burrows.

Small Mammals

Mr. Forde has attended workshops hosted by Bat Conservation International, Michael O'Farrell, Chris Corben, The Wildlife Society, The Desert Institute, and the National Trust for Scotland that focused upon the ecology and identification of small mammals. He has conducted surveys for small mammals throughout southern California using a variety of methods to identify them including trapping, spotlighting, scent/track stations, and camera stations. He has also conducted surveys in Arizona, Nevada, Utah, and the west coast of Scotland using mist-nets, hand-held nets, harp traps, to capture and identify bats. He has captured and identified numerous special-status species including western small-footed myotis, long-eared myotis, fringed myotis, long-legged myotis, silver-haired bat, western red bat, pallid bat, greater bonneted bat, and state candidate, Townsend's big-eared bat. He also uses acoustical equipment and analytical software to identify bats using full spectrum, heterodyne, frequency-division, and time-expansion, and conducts emergence surveys using spotlights, infrared lights (IRLamp6), and night-vision cameras (Sony Night Shot, Samsung Nite Lite).

Special Training

- Giant Garter Snake, The Wildlife Society, 2003
- Blunt-Nosed Leopard Lizard Survey Technique & Identification, The Wildlife Society, 2003
- Owl Survey Techniques, Kern River Preserve, 2002
- Desert Tortoise Survey and Handling Workshop, The Desert Tortoise Council, November 2002
- Desert Mammals, The Desert Institute, 2002
- Desert Birds, The Desert Institute, 2002
- Desert Reptiles & Amphibians, The Desert Institute, 2002
- Springtime Desert Butterflies, San Diego Natural History Museum, 2002
- Flat-tailed Horned Lizard, Bureau of Land Management, 2001
- Arroyo Toad Handling Techniques, Authorized by U.S. Fish and Wildlife Service, 2001
- Burrowing Owl Ecology, University California Davis, Raptor Center, 1999
- Raptor Capture & Handling Techniques, University California Davis, Raptor Center, 1999
- Bird Banding & Species Identification, Ventana Wilderness Sanctuary, 1998

Special Training

Environmental Law Conference, The State Bar of California, October 2014

Environmental Law Conference, The State Bar of California, October 2006

Advanced Wetland Delineation, Richard Chinn Environmental, 2003

Navigating Federal & State Permits for Developments in Waters of California, University of California Los Angeles, 2002

Wetland Delineation & Management, Richard Chinn Environmental, 2002

The Basics of the California Environmental Quality Act, Association of Environmental Professionals, 2002

Botanical Surveys

Mr. Forde has held CDFW State-Listed Plant Collection Permits authorizing him to collect state listed endangered, threatened, and rare plants in California. He has conducted botanical surveys in Imperial, San Diego, Orange, Riverside, San Bernardino, Los Angeles, Ventura, and Santa Barbara counties. He has observed numerous special-status, rare, threatened, and endangered species including Catalina mariposa lily, slender mariposa lily, Plummer's mariposa lily, Lewis's evening primrose, southern tarplant, San Fernando spineflower, Parry's spine-flower, Santa Susana tarplant, Agoura Hills dudleya, Santa Monica Mountains dudleya, Conejo dudleya, Conejo buckwheat, and Lyon's pentachaeta,

Wetland Delineation

Mr. Forde has attended basic and advanced wetland delineation workshops and attended courses hosted by the University of California, Los Angeles that focused on federal and state permitting for development in waters of California. The workshops focused on the application of the 1987 Wetland Delineation Manual and Regional Supplements used by the Army Corps of Engineers. During the workshops and courses, he gained valuable knowledge and experience of technical guidelines for wetland delineation, regional supplement field indicators for hydrophytic vegetation, hydric soils, and wetland hydrology, methods for making jurisdictional determinations, and the permitting process. Since that time, he has delineated streams and wetlands in Orange, Riverside, San Bernardino, Ventura, and Los Angeles counties including major portions of the Santa Clara River and the Ballona Wetlands. He has also prepared Section 404 (US Army Corp of Engineers), Section 401 (Regional Water Quality Control Board), and Section 1600 Streambed Alteration Agreement (CDFW) applications.

Research Experience

Central Valley Habitat Joint Venture, California Department of Fish and Wildlife, Sacramento County, CA, 1999-2001

Participated in research that sought to identify habitat use by a range of waterfowl species including northern pintail, green-winged teal, mallard, and white-fronted geese. Responsibilities included capture using rocket-fired nets and box traps, age and sex classification, attaching transmitters, and tracking movements using aerial and land based telemetry techniques.

United States Geological Survey, Yolo County, CA and California Department of Fish and Wildlife, Sacramento County, CA 1999 - 2001

Participated in research specifically aimed at developing a reliable methodology to index the Pacific Coast population of band-tailed pigeons and to document behavior associated with mineral gravelling and its relationship to nest site selection and nest success. Responsibilities included capture using rocket-fired nets and box traps, age and sex classification, attaching transmitters, tracking movements, and locating nests using aerial and land based telemetry techniques. Location data was determined by triangulation and by the use of Remote Data Systems, Global Positioning Systems, and Geographic Information Systems.

Big Sur Ornithology Laboratory & California Condor Recovery Program, Monterey County, CA, 1997-1998

Collected data related to demographic parameters, reproductive success, survival, and migration of riparian birds. Responsibilities included capture using mist-nets, species identification, age and sex classification, measuring morphological characteristics, behavioral observations, point counts, territory mapping, and habitat assessment. Responsibilities to the condor program included pre-release conditioning, release, tracking movements using land based telemetry techniques, trapping and handling for replacement of radio transmitters, and collecting blood samples, and assisting with the supplemental feeding program.