
Appendix B1

Biological Resources Assessment

Biological Resources Assessment

1100 Rancho Conejo

Biotech Campus

MAY 2022

Prepared for:

CITY OF THOUSAND OAKS

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Acronyms and Abbreviations

| Acronym/Abbreviation | Definition |
|----------------------|--|
| CDFW | California Department of Fish and Wildlife |
| CEQA | California Environmental Quality Act |
| CESA | California Endangered Species Act |
| City | City of Thousand Oaks |
| CNDDDB | California Natural Diversity Database |
| CNPS | California Native Plant Society |
| CRPR | California Rare Plant Rank |
| CWA | Clean Water Act |
| FAC | Facultative |
| FESA | federal Endangered Species Act |
| IPaC | Information for Planning and Consulting |
| ISA | International Society of Arboriculture |
| MBTA | Migratory Bird Treaty Act |
| OHWM | ordinary high water mark |
| Project | Biotech Campus Project |
| RWQCB | Regional Water Quality Control Board |
| USACE | U.S. Army Corps of Engineers |
| USFWS | U.S. Fish and Wildlife Service |

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1 Introduction

Dudek biologists and International Society of Arboriculture (ISA) Certified Arborists prepared this Biological Resources Assessment on behalf of the City of Thousand Oaks (City) to identify the potential for biological resources to occur within and adjacent to the proposed Biotech Campus Project (Project) at 1100 Rancho Conejo on the existing vacant industrial park previously owned and occupied by Amgen including three existing, two-story buildings totaling 167,475-square-foot buildings and used for office and associated existing hardscape and landscape areas. The Project would involve demolition of the existing buildings and construction of a one-story amenity building and three two-story lab office buildings with surface parking lots. This report's primary intent is to support the City's California Environmental Quality Act (CEQA) reporting and review process for the Project. The report also provides recent data and analysis that will be useful in future consultation and/or permit application review by other applicable regulatory resource agencies, including the U.S. Fish and Wildlife Service (USFWS), the U.S. Army Corps of Engineers (USACE), the Central Coast Regional Water Quality Control Board (RWQCB), and California Department of Fish and Wildlife (CDFW).

1.1 Site Location and Land Use Designation

The Project site is located at 1100 Rancho Conejo Boulevard, Thousand Oaks (Assessor's Parcel Number 667-0-100-235) east of Rancho Conejo Boulevard and north of Ventu Park Road, as shown in Figure 1, Project Location. The site is an 18.99-acre industrial property comprised primarily of impervious surfaces: parking lot, buildings/structures, and concrete walkway. Landscaping is interspersed throughout the site with an undeveloped area in the northeast portion of the site. Surrounding land uses in the area include industrial to the northwest, residential to the northeast and southeast, manufacturing to the south, industrial parking to the southwest, and industrial to the west.

1.2 Project Description

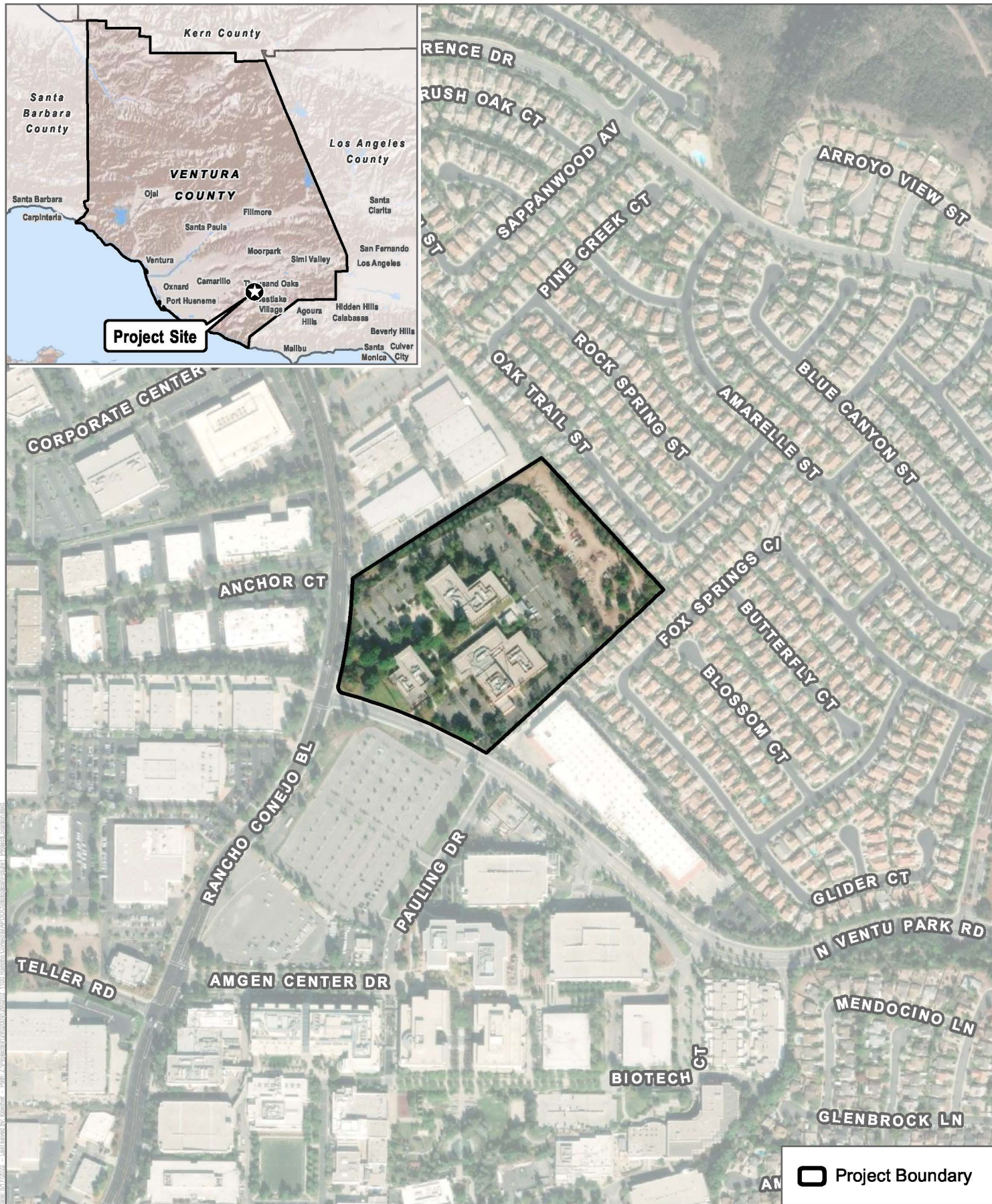
The Project is located on an 18.99-acre site at 1100 Rancho Conejo Boulevard, at the intersection of Rancho Conejo Boulevard and Ventu Park Road north of Interstate 101 in Thousand Oaks, California. Access to the Project site is provided via on both Ventu Park Road and Rancho Conejo Boulevard. The Project site is designated as Industrial Park Zone M-1 within the General Plan Industrial zone.

The Project consist of construction of a one-story amenity building, 25,840 square feet and three, two-story lab office buildings totaling 325,324 square feet with a surface parking lots with a total of 855 parking spaces. The lab and office buildings would be 40% office and 60% lab with common lobbies, restrooms, loading areas for the amenity building, lab office building A, and shared loading for lab office buildings B and C.

The Project entails a request for demolition of three existing, two-story buildings totaling 167,475-square-foot buildings previously owned and occupied by Amgen and used for office and associated existing hardscape and landscape areas.

To allow demolition of three existing, two-story buildings totaling 167,475-square-foot buildings previously owned and occupied by Amgen and used for office and associated existing hardscape and landscape areas. The new construction will include a one-story amenity building, 25,840 square feet and three, two-story lab office buildings totaling 325,324 square feet with a surface parking lots with a total of 855 parking spaces. The lab and office buildings would be 40% office and 60% lab with common lobbies, restrooms; there will be loading areas for the amenity building, lab office building A, and shared loading for lab office buildings B and C.

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SOURCE: ESRI World Imagery

FIGURE 1
Project Location
1100 Rancho Conejo

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2 Regulatory Framework

This section outlines the federal, state, and local regulations pertinent to the biological resources located on the Project site. Some of the biological resources that could be affected by the Project are regulated by resource agencies that often overlap in jurisdiction. This section identifies and discusses the various programs regulating federally and/or state-listed threatened or endangered plants and wildlife, sensitive vegetation communities, and jurisdictional aquatic resources, such as drainages, streambeds, riparian habitat, and wetlands.

2.1 Federal

2.1.1 Federal Endangered Species Act

The federal Endangered Species Act (FESA) of 1973, as amended (16 USC 1531 et seq.), serves as the enacting legislation to list, conserve, and protect threatened and endangered species, and the ecosystems on which they depend, from extinction. In addition, for those wildlife species listed as federally endangered, FESA provides for the ability to designate critical habitat, defined as that habitat considered “essential to the conservation of the species” and that “may require special management considerations or protection.” Under FESA Section 7, if a project that would potentially result in adverse impacts to threatened or endangered species includes any action that is authorized, funded, or carried out by a federal agency, that agency must consult with the USFWS to ensure that any such action is not likely to jeopardize the continued existence of any endangered species or threatened species or result in the destruction or adverse modification of designated critical habitat for that species. FESA Section 9(a)(1)(B) prohibits the taking, possession, sale, or transport of any endangered fish or wildlife species. “Take” is defined to mean “harass, harm, pursue, hunt, shoot, wound, kill, trap, capture, or collect, or to attempt to engage in any such conduct” (16 USC 1532 (19)). With respect to any endangered species of plant, Sections 9(a)(2)(A) and 9(a)(2)(B) prohibit the possession, sale, and import or export, of any such species, and prohibits any action that would “remove and reduce to possession any such species from areas under federal jurisdiction; maliciously damage or destroy any such species on any such area; or remove, cut, dig up, or damage or destroy any such species on any other area in knowing violation of any law or regulation of any State or in the course of any violation of a State criminal trespass law.” Pursuant to FESA Section 10(a)(1)(B), the USFWS may issue a permit for the take of threatened or endangered species provided that such taking is “incidental to, and not the purpose of, the carrying out of an otherwise lawful activity.”

2.1.2 Migratory Bird Treaty Act

The Migratory Bird Treaty Act (MBTA) regulates or prohibits taking, killing, possession of, or harm to migratory bird species listed in Title 50, Section 10.13 of the Code of Federal Regulations. The MBTA is an international treaty for the conservation and management of bird species that migrate through more than one country and is enforced in the United States by the USFWS. Hunting of specific migratory game birds is permitted under the regulations listed in Title 50, Section 20 of the Code of Federal Regulations. The MBTA was amended in 1972 to include protection for migratory birds of prey (raptors). On December 22, 2017, the Department of Interior issued a legal opinion (M- Opinion 37050) that interpreted the above prohibitions as only applying to direct and purposeful actions of which the intent is to kill, take, or harm migratory birds; their eggs; or their active nests. Incidental take of birds, eggs, or nests that are not the purpose of such an action, even if there are direct and foreseeable results, was not

prohibited. On January 7, 2021, the USFWS published a final rule (the January 7th rule) that codified the previous administration's interpretation, which after further review was determined to be inconsistent with the majority of relevant court decisions and readings of the MBTA's text, purpose, and history. On May 7, 2021, the USFWS published a proposed rule to revoke the January 7th rule, which would result in a return to implementing the statute as prohibiting incidental take. On July 19, 2021, the USFWS announced the availability of two revised economic analysis documents for public review that evaluate the potential for the proposed rule to impact small entities, including businesses, governmental jurisdictions, and other organizations. The public review period on these documents ended on August 19, 2021. A final rule revoking the January 7th rule was published on October 4, 2021 and went into effect on December 3, 2021. In their summary of the October 4, 2021 final rule, the USFWS explained that "the immediate effect of this final rule is to return to implementing the MBTA as prohibiting incidental take and applying enforcement discretion, consistent with judicial precedent and longstanding agency practice prior to 2017" (86 FR 54642).

2.1.3 Clean Water Act – Section 404

The objective of the Clean Water Act (CWA) is to restore and maintain the chemical, physical, and biological integrity of the nation's waters. Under Section 404 of the CWA, USACE has the authority to regulate activities that could discharge fill or dredge material or otherwise adversely modify wetlands or other waters of the United States. The USACE implements the federal policy embodied in Executive Order 11990, which, when implemented, is intended to result in no net loss of wetland values or function.

2.1.4 Clean Water Act – Section 401

The State Water Resources Control Board has authority over wetlands through Section 401 of the CWA, as well as the Porter–Cologne Act, California Code of Regulations Section 3831(k), and California Wetlands Conservation Policy. The CWA requires that an applicant for a Section 404 permit (to discharge dredge or fill material into waters of the United States) first obtain certification from the appropriate state agency stating that the fill is consistent with the state's water quality standards and criteria. In California, the authority to either grant certification or waive the requirement for permits is delegated by the State Water Resources Control Board to the nine regional boards. The Los Angeles RWQCB has authority for Section 401 compliance in the Project site. A request for certification is submitted to the regional board at the same time that an application is filed with the USACE.

2.2 State

2.2.1 California Endangered Species Act

Under the California Endangered Species Act (CESA), the California Fish and Game Commission has the responsibility of maintaining a list of threatened and endangered species. CESA prohibits the take of state-listed threatened or endangered animals and plants unless otherwise permitted pursuant to CESA. Take under CESA is defined as any of the following: "hunt, pursue, catch, capture, or kill, or attempt to hunt, pursue, catch, capture, or kill" (California Fish and Game Code Section 86). Unlike the FESA, CESA does not include harassment or harm (e.g., habitat degradation) in its definition of take. Species determined by the State of California to be candidates for listing as threatened or endangered are treated as if listed as threatened or endangered and are, therefore, protected from take. Pursuant to CESA, a state agency reviewing a project within its jurisdiction must determine whether any state-listed endangered or threatened species, or candidate species, could be potentially impacted by that project.

2.2.2 California Department of Fish and Wildlife Special-Status Plants

For this analysis, special-status plant species are defined as plants that are legally protected or that are otherwise considered sensitive by federal, state, or local resource conservation agencies. These species fall into one or more of the following categories:

- Listed by the federal government under FESA or the state under CESA as endangered, threatened, or rare
- A candidate for federal or state listing as endangered or threatened
- Taxa that are biologically rare, very restricted in distribution, or declining throughout their range but not currently threatened with extirpation
- Population(s) in California that may be peripheral to the major portion of a taxon's range, but are threatened with extirpation in California
- Taxa closely associated with a habitat that is declining in California at a significant rate (e.g., wetlands, riparian, vernal pools, old growth forests, desert aquatic systems, native grasslands, valley shrubland habitats)

Taxa considered to be “rare, threatened, or endangered in California” as defined by CDFW and assigned a California Rare Plant Rank (CRPR). The CDFW system includes six rarity and endangerment ranks for categorizing plant species of concern, as follows:

- CRPR 1A – Plants presumed extirpated in California and either rare or extinct elsewhere
- CRPR 1B – Plants that are rare, threatened, or endangered in California and elsewhere
- CRPR 2A – Plants presumed to be extinct in California, but more common elsewhere
- CRPR 2B – Plants that are rare, threatened, or endangered in California, but more common elsewhere
- CRPR 3 – Plants about which more information is needed (a review list)
- CRPR 4 – Plants of limited distribution (a watch list)

Plants ranked as CRPR 1A, 1B, 2A, or 2B may qualify as endangered, rare, or threatened species within the definition of CEQA Guidelines Section 15380. CDFW recommends that potential impacts to CRPR 1 and 2 species be evaluated in CEQA review documents. In general, CRPR 3 and 4 species do not meet the definition of endangered, rare, or threatened pursuant to CEQA Guidelines Section 15380, but these species may be evaluated on a case-by-case basis.

2.2.3 California Department of Fish and Wildlife Species of Special Concern

CDFW maintains a list of vertebrate animal species considered of “special concern” because declining population levels, limited ranges, and/or continuing threats have made them vulnerable to extinction. A Species of Special Concern is a species, subspecies, or distinct population of an animal native to California that currently satisfies one or more of the following (not necessarily mutually exclusive) criteria:

- Is extirpated from the state or, in the case of birds, is in its primary seasonal or breeding role
- Is listed as threatened or endangered federally, but not by the state
- Meets the state definition of threatened or endangered, but has not formally been listed

- Is experiencing, or formerly experienced, serious noncyclical population declines or range retractions (not reversed) that, if continued or resumed, could qualify it for threatened or endangered status by the state
- Has naturally small populations exhibiting high susceptibility to risk from any factor(s) that, if realized, could lead to declines that would qualify it for threatened or endangered status by the state

Impacts to Species of Special Concern are typically evaluated and mitigated within the context of an environmental impact report or other document prepared pursuant to CEQA.

2.2.4 Fish and Game Code Section 1600 – Lake and Streambed Alteration Agreement

Under Sections 1600–1616 of the California Fish and Game Code, CDFW regulates activities that would alter the flow, bed, channel, or bank of streams and lakes. The limits of CDFW’s jurisdiction are defined in the code as the “bed, channel or bank of any river, stream, or lake designated by the department in which there is at any time an existing fish or wildlife resource or from which these resources derive benefit” (Section 1601). In practice, CDFW usually marks its jurisdictional limit at the top of the stream or bank, or at the outer edge of the riparian vegetation, whichever is wider.

2.2.5 California Department of Fish and Wildlife – Wetlands Protection Regulations

CDFW derives its authority to oversee activities that affect wetlands from state legislation. This authority includes California Fish and Game Code Sections 1600–1616 (lake and streambed alteration agreements), CESA (protection of state-listed species and their habitats, which could include wetlands), and the Keene–Nejedly California Wetlands Preservation Act of 1976 (states a need for an affirmative and sustained public policy program directed at wetlands preservation, restoration, and enhancement). In general, CDFW asserts authority over wetlands within the state through any of the following: review and comment on USACE Section 404 permits, review and comment on CEQA documents, preservation of state-listed species, or lake and streambed alteration agreements.

2.2.6 California Fish and Game Code, Section 1940 – Sensitive Natural Communities

California Fish and Game Code Section 1940 requires CDFW to develop and maintain a vegetation mapping standard for the state. More than half of the vegetation communities in the state have been mapped through the Vegetation Classification and Mapping Program.

Natural vegetation communities are evaluated by CDFW and are assigned global and state (S) ranks based on rarity of and threats to these vegetation communities in California. Natural communities with ranks of S1 through S3 (S1: critically imperiled; S2: imperiled; S3: vulnerable) are considered sensitive. Sensitive natural communities are communities that have a limited distribution and are often vulnerable to the environmental effects of projects. These communities may or may not contain special-status species or their habitats. For purposes of this assessment, sensitive natural communities include vegetation communities listed in CDFW’s California Natural Diversity Database (CNDDB) and communities listed in the Natural Communities List with a rarity rank of S1, S2, or

S3. Additionally, all vegetation associations within the alliances with ranks of S1 through S3 are considered sensitive habitats. CEQA requires that impacts to sensitive natural communities be evaluated and mitigated to the extent feasible.

2.2.7 California Fish and Game Code, Sections 3503, 3503.5, 3511, 3513

Section 3503 of the California Fish and Game Code states that it is unlawful to take, possess, or needlessly destroy the nests or eggs of any bird, except as otherwise provided by this code or any regulation made pursuant thereto. Section 3503.5 protects all birds of prey (raptors) and their eggs and nests. Section 3511 states that fully protected birds or parts thereof may not be taken or possessed at any time. Section 3513 states that it is unlawful to take or possess any migratory non-game bird as designated in the MBTA.

2.2.8 California Fish and Game Code, Section 4150

California Fish and Game Code Section 4150 states a mammal occurring naturally in California that is not a game mammal, fully protected mammal, or fur-bearing mammal is a non-game mammal. A non-game mammal may not be taken or possessed under this code. All bat species occurring naturally in California are considered non-game mammals and are therefore prohibited from take as stated in California Fish and Game Code Section 4150.

2.2.9 Porter-Cologne Water Quality Control Act

The Porter-Cologne Water Quality Control Act established the State Water Resources Control Board and each RWQCB as the principal state agencies responsible for the protection of water quality in California. As noted under the discussion of the CWA, the Los Angeles RWQCB has regulatory authority over the Project site.

The Porter-Cologne Water Quality Control Act provides that “[a]ll discharges of waste into the waters of the State are privileges, not rights.” Waters of the state are defined in Section 13050(e) of the Porter-Cologne Water Quality Control Act as “any surface water or groundwater, including saline waters, within the boundaries of the state.” All dischargers are subject to regulation under the Porter-Cologne Water Quality Control Act, including both point and nonpoint source dischargers. The Los Angeles RWQCB has the authority to implement water quality protection standards through the issuance of permits for discharges to waters at locations within its jurisdiction. As noted in the discussion of the CWA, the Los Angeles RWQCB is the appointed authority for Section 401 compliance in the Project site.

2.2.10 California Environmental Quality Act

CEQA Guidelines Section 15380(b) provides that a species not listed on the federal or state list of protected species may be considered rare or endangered if the species can be shown to meet certain criteria. These criteria have been generally modeled after the definition in FESA and Chapter 1.5 of the California Fish and Game Code that addresses rare or endangered plants and animals. Appendix G of the CEQA Guidelines requires a lead agency to determine whether or not a project would “have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service.”

CEQA Guidelines Section 15065 requires that a lead agency find an impact to be significant if a project would “substantially reduce the number or restrict the range of an endangered, rare, or threatened species.”

2.3 Local

2.3.1 City of Thousand Oaks General Plan

The City’s General Plan identifies goals, policies, and implementation actions to protect the City’s natural resources including community forestry, conservation, forestry, housing, land use/circulation, noise, open space, public buildings, safety, scenic highway, and social resources. Policies are set forth for the protection of these resources accordingly. The relevant General Plan Community Forest Element policies are as follows (City of Thousand Oaks 2017).

Community Forest Element

Tree Protection

- F-13. The City’s legacy of trees shall preserved through the rigorous enforcement of its Oak and Landmark Tree Ordinances. City staff shall keep current with research and practices relating to oak tree preservation and should disseminate such information to maintenance personnel, property owners and others responsible for the City’s oak and landmark trees.
- F-15. Where practical, the City should strive to preserve mature trees of any species when associated with a development proposal.

Tree Maintenance Practices

- F-20. The City shall properly dispose of removed trees and clippings, to control the spread of pests and disease and recycle tree waste to the maximum extent feasible.

Tree Planting

- F-21. The City shall ensure complete street tree plantings of appropriate species, scale and spacing in all new developments. Developers will be required to provide street trees in accordance with applicable ordinances. This will ensure that the community’s character is maintained through a constant, consistent forest; significantly reduce the amount of heat the community produces, resulting in reduced cooling costs and energy consumption; and help make the City more pedestrian friendly. To enhance canopy coverage, alternatives such as narrower streets, greater use of medians and bumped-out planting bulbs with the parking land should be considered.
- F-22. A diversity of species and ages of trees should be assured throughout the City in order to avoid potentially unhealthy monocultures. Plantings along major streets should provide for differences between median and curbside plantings or similar means of introducing variety while maintaining landscape consistency. Plantings along single neighborhood streets may be of a single species, although the use of accent species at corners or as an understory is encouraged. City staff should use a tree inventory to monitor Citywide species composition and should recommend changes to landscape submittals based on achieving the City’s objectives. Age diversity should be achieved by immediately replacing individual trees as they are removed, by intermixing fast and slow growing species, and by planting replacement trees next to declining trees where feasible.

Tree Selection

- F-23. Plant species which are well adapted to the planting site and which will create maximum benefits with minimum problems should be planted. Proposed species should be carefully evaluated as to their likely performance in a given situation, the problems they may pose, and their ability to deliver the benefits that the planting is intended to provide. Trees should be selected using species selection and design guidelines and the planting palette from the Forestry Master Plan.
- F-24. Adequate space and site conditions should be provided for healthy tree growth to full maturity. City staff should evaluate proposed planting sites and suggest modifications that will provide for the best possible growing conditions for the trees. In particular, adequate unconstricted, uncompacted root room and ample air space for the trees full growth should be provided. In new developments utilities should be undergrounded outside the root zone of street trees. Narrow existing parkways should be widened wherever possible. Larger planting areas with clusters of trees should be encouraged.

Tree Canopy Coverage

- F-26. The tree canopy coverage of parking areas should be maximized in all developments. City staff shall administer and enforce parking lot landscape design guidelines. Furthermore, trees prone to messy insect problems or excess leaf/flower drop should be discouraged in parking areas to avoid problems (such as tree droppings and stained car finishes) that usually result in the removal of trees.

Planting Native Trees

- F-30. A variety of oaks and other species native to this area should be planted in appropriate situations. The use of oaks should be encouraged where appropriate and adequate growing conditions can be provided. The design of major streets should seek to create spaces where oaks can be used as an accent tree. Oaks should be considered in special planting areas and at important intersections and other visually important spots. Any oak or landmark tree removed by development should be replaced with trees of the same species, as determined by the size of the tree removed and pursuant to the Oak and Landmark Tree Ordinances.

Tree Placement

- F-36. A strong complement of street trees should be provided, especially when they are planted in easements behind the sidewalk or are otherwise not visibly part of the public right-of-way. A clear pattern of street trees is often not discernable in some new subdivisions where all planting occurs behind the sidewalk. The widespread use of narrow "monolithic" sidewalks immediately behind the curb places required street trees in the public service easement, rather than in a clearly defined public planting strip. While this placement may benefit trees by giving them more root room, it can also reduce their visual impact as well as reduce their ability to shade the street. Such plantings should be of a scale and regularity which provides both ample shading and a visual consistency to the street.

Site Appropriate Plantings

- F-38. Environmental factors should be given equal weight with aesthetic considerations when making planting decisions. Careful use of the City's tree selection criteria and planting palette should be required to assure environmentally appropriate selections that also enhance the aesthetic character of the community.

Trees on Private Property

- F-47. The City should assure ample off-street plantings in new developments and, where practical, in rehabilitations. Whenever the City issues a building permit for construction, it should require appropriate landscaping pursuant to its Guidelines for Landscape Planting and Irrigation Plans. City staff shall assure compatibility with adjacent right-of-way and public service easement plantings.
- F-48. The City should ensure that homeowners' associations and others responsible for landscapes fronting public streets plant and maintain these areas in conformance with City standards. The City should require planting and maintenance in accordance with the Guidelines for Landscape Planting. In administering these guidelines, City staff should assure that planting is compatible with adjacent public and private plantings and that the required maintenance plan references City standards. City staff should take necessary steps to enforce these provisions, including protection of landscapes installed under the guidelines, while also undertaking public education efforts to encourage the proper maintenance of all trees within the City.

Conservation Element

Relevant policies of the General Plan Conservation Element are as follows (City of Thousand Oaks 2013):

F. Stormwater Retention and Debris Basins

- CO-15. Every effort shall be made to design and construct stormwater retention and debris basins to minimize any potentially adverse impacts to significant landform features, aquatic resources, and associated native plant and animal communities.

H. Native Plant and Wildlife Resources

- CO-21. The City shall encourage the proper management, conservation and protection of native plant communities throughout the City's Planning Area, including developed areas and undeveloped open space lands.

I. Wildlife Movement Corridors

- CO-28. Urban land uses adjoining natural open space areas should be designed in a manner that is sensitive to the needs of wildlife and avoids or minimizes any potentially adverse impacts to movement corridors.

J. Oak and Landmark Trees

- CO-29. Continue to protect oak and landmark trees and their habitat in recognition of their historic, aesthetic and environmental value to the citizens of Thousand Oaks, in particular Valley Oak habitat.

L. Rare, Threatened or Endangered Species

- CO-32. The City shall encourage and promote the conservation and protection of all rare, threatened, endangered or sensitive species listed by State and Federal agencies (United States Fish and Wildlife Service and California Department of Fish and Wildlife), the California Native Plant Society (CNPS), the County of Ventura and the City of Thousand Oaks.

2.3.2 City of Thousand Oaks – Oak Trees and Landmark Trees

The City protects oak trees and landmark trees through City Ordinance. Municipal Code Section 9-4.42 provides the oak tree protection ordinance and Municipal Code Section 9-4.43 provides the landmark tree preservation ordinance. The City requires a permit for removal, pruning, or encroachment into the protected zone of any oak tree or landmark tree, which are defined as follows:

- **Oak Tree:** any oak tree of the genus *Quercus* including, but not limited to, valley oak (*Quercus lobata*), coast live oak (*Quercus agrifolia*), and Inland scrub oak (*Quercus berberidifolia*), regardless of size. (Thousand Oaks Municipal Code, Title 9, Chapter 4, Article 42: Oak Tree Preservation and Protection)
- **Landmark Tree:** Specimens of the following species which have reached the designated maturity: California sycamore (*Platanus racemosa*) which exceed twelve (12") inches in diameter when measured at a point four and one-half (4 1/2') feet above the natural grade at the base of the tree; California bay (*Umbellularia californica*) which exceed eight (8") inches in diameter when measured at a point four and one-half (4 1/2') feet above the natural grade at the base of the tree; Southern California black walnut (*Juglans californica*) which exceed eight (8") inches in diameter when measured at a point four and one-half (4.5') feet above the natural grade at the base of the tree; toyon (*Heteromeles arbutifolia*) which exceeds eight (8") inches in diameter when measured at a point four and one-half (4.5') feet above the natural grade at the base of the tree. Trees with multiple trunks shall be deemed to have reached maturity if the sum of the diameters of the multiple trunks exceeds the required diameter plus two (2") inches of a single trunked tree. Landmark trees shall also include all designated historic trees. (Thousand Oaks Municipal Code, Title 9, Chapter 4, Article 43: Landmark Tree Preservation and Protection)
- **Protected Zone:** a specifically defined area totally encompassing a landmark or historic tree within which work activities are strictly controlled. When depicted on a map, the outermost edge of the protected zone will appear as an irregular shaped circle that follows the contour of the dripline of the tree. Using the dripline as a point of reference, the protected zone shall commence at a point five (5') feet outside of the dripline and extend inward to the trunk of the tree. In no case shall the protected zone be less than fifteen (15') feet from the trunk of a landmark tree (both code sections).

2.3.3 Locally Important Species Lists

The Ventura County Planning Division maintains lists of locally important plants and locally important animals (Ventura County Planning Division 2014, 2018) that are significant biological resources to be protected from incompatible land uses and development.

2.3.4 Checklist of Ventura County Rare Plants

The Checklist of Ventura County Rare Plants (Magney 2020) expands upon the Locally Important Plant List (2018) and includes plants species that are rare (5 or fewer extant populations in the country) or uncommon (6 to 10 extant populations).

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3 Methodology

3.1 Literature and Database Review

A review of literature and database were performed, including biological references and relevant lists and databases pertaining to the status and known occurrences of sensitive and special-status resources. The location of documented sensitive vegetation communities, special-status plant species, and special-status wildlife species present in the vicinity of the Project and that have potential to occur on site were identified through a query of the CNDDDB (CDFW 2022) and California Native Plant Society (CNPS) online Inventory of Rare and Endangered Plants (CNPS 2022) with a 5-mile buffer. Other data reviewed included aerial photographs and relevant policy and planning documents. In summary, the following were reviewed for this Project:

- CDFW CNDDDB (CDFW 2022)
- Checklist of Ventura County Rare Plants (Magney 2020)
- CNPS Inventory of Rare and Endangered Plants (CNPS 2022)
- List of potentially occurring listed species generated from a review of USFWS's Information for Planning and Consulting (IPaC) Trust Resources Report list of federal and threatened species (USFWS 2022a)
- Landmark Tree and Oak Tree Report (Appendix A)
- U.S. Geological Survey National Hydrography Dataset (USGS 2022)
- USFWS Critical Habitat Mapper (USFWS 2022b)
- USFWS National Wetlands Inventory (USFWS 2022c)

3.1.1 Landmark Tree and Oak Tree Report

Dudek ISA Certified Arborist Ryan Allen reviewed the Landmark Tree and Oak Tree Report (Appendix A), which documented the City's-defined landmark trees and oak trees present within the Project site. L. Newman assessed the trees in August/September 2021 using the L. Newman Design Group standard visual inspection. The trees were tagged with metal, numbered tags. A tag was affixed to the side of each tree and the tag number corresponds to the numbers in the summary of field observations table, dripline measurements table, and tree location map included in the Landmark Tree and Oak Tree Report (Appendix A). The survey included live trees with trunk diameters that meet the minimum diameter at the specified height. The trees were inspected using the ISA Level 2 or Basic Assessment that is a ground-level, visual inspection assessing general tree health using measuring tools to observe the exterior of each tree.

3.2 Biological Surveys

3.2.1 Reconnaissance-Level Biological Survey

Dudek biologist Heather Moine conducted a site visit on May 2, 2022, to perform a reconnaissance-level biological survey to assess existing biological conditions, including vegetation community and land cover mapping, a habitat assessment for special-status plant and special-status wildlife species, documentation of any wildlife

connectivity/movement features, and an assessment of potential aquatic resources, as shown in Table 1. During the survey, Dudek biologist Heather Moine documented plant species and wildlife species that were found to occur within the Project site.

Table 1. Summary of Reconnaissance-Level Biological Survey Personnel and Conditions

| Date | Time | Personnel | Weather Conditions |
|----------|-----------|---------------|---|
| 5/2/2022 | 1000–1519 | Heather Moine | 61 °F to 68 °F, 0–100% cloud cover, 0–6 mile per hour winds |

Vegetation Community and Land Cover Mapping

Dudek biologist Heather Moine mapped and characterized vegetation communities and land covers within the Project site. The mapping methods are consistent with CDFW’s Protocols for Surveying and Evaluating Impacts to Special Status Native Plant Populations and Sensitive Natural Communities (CDFW 2018) and Survey of California Vegetation Classification and Mapping Standards (CDFW 2020a). Natural vegetation communities were classified according to A Manual of California Vegetation, Second Edition (Sawyer et al. 2009) at the vegetation alliance level and, where appropriate, to the association level. Vegetation communities were classified based on site factors, descriptions, distribution, and characteristic species present in the area. Information such as dominant species and associated cover classes and visible disturbance factors were recorded. In some areas, the vegetation communities observed in the field did not match those described A Manual of California Vegetation, Second Edition (Sawyer et al. 2009) or other classification systems recognized by the CDFW (2021a, 2021b). In these instances, Dudek biologist Heather Moine generated additional appropriate, site-specific vegetation community or land cover classifications.

Vegetation communities were mapped to the alliance level except where mapping to the finer-scale association level was necessary to determine sensitivity in accordance with the most recent version of the California Natural Community List (CDFW 2021a). Also, because non-native grasslands are not classified as a sensitive natural community, these vegetation communities were not mapped to the alliance or association level. For example, a stand of ripgut brome (*Bromus diandrus*) was simply mapped as non-native grasslands because alliance- and association-level information would not change the fact that non-native grasslands are not considered sensitive. Minimum mapping units were established to standardize the scale and appropriate evaluation of stands, as recommended by the CDFW (2020a). One acre for upland natural communities not considered sensitive, and 0.25 acres for sensitive vegetation communities and wetland or riparian vegetation communities were used as minimum mapping units.

Sensitive vegetation communities are those considered rare within the region or sensitive by CDFW (2021a). Vegetation communities are given a State Rarity Ranking on a scale of 1 to 5. Vegetation communities with State Rarity Rankings of S1-S3 are considered sensitive vegetation communities. Additionally, vegetation community associations designated with a Y (Yes) in the sensitivity column are considered sensitive.

Dudek biologist Heather Moine mapped vegetation communities and collected data in the field using an ESRI ArcGIS mobile application. A Dudek geographic information system (GIS) technician transferred the vegetation boundaries into an ArcGIS file and created a GIS coverage for vegetation communities. Once major line work and community designations were completed, a geodatabase was created to verify all electronic boundaries were topologically correct and met final quality control and assurance procedures.

Wildlife Species

Dudek biologist Heather Moine walked the site utilized site, sound, and binoculars and to observe wildlife species. A list of wildlife species observed was recorded.

Plant Species Names and Wildlife Species Names

Scientific and common names for plant species with a California Rare Plant Rank (CRPR; formerly CNPS List) follow the California Native Plant Society On-Line Inventory of Rare, Threatened, and Endangered Plants of California (CNPS 2020). For plant species without a CRPR, scientific names follow the Jepson Interchange List of Currently Accepted Names of Native and Naturalized Plants of California (Jepson Flora Project 2020) and common names follow the California Natural Community list (CDFW 2020b) or the United States Department of Agriculture's Natural Resources Conservation Service Plants Database (USDA 2020).

Scientific and common names of animals follow Crother (2017) for reptiles, American Ornithological Society (AOS 2021) for birds, and Mammal Diversity Database (2021) for mammals.

3.2.2 Focused Survey for Special-Status Plant Species

Based on the reconnaissance-level biological survey, Dudek biologist Heather Moine identified native vegetation habitats within the northeast and eastern portions of the site. The literature and database review identified special-status plant species that occur within the vicinity of the Project and have potential to occur in on the Project site based on the habitat suitability assessment. Dudek biologist Heather Moine, familiar with the target special-status plant species and general flora of the Ventura County region, conducted a seasonally timed focused survey in May 2022, as shown in Table 2.

Focused special-status plant surveys conformed to the CNPS Botanical Survey Guidelines (CNPS 2001); Protocols for Surveying and Evaluating Impacts to Special Status Native Plant Populations and Sensitive Natural Communities (CDFW 2018); and USFWS's General Rare Plant Survey Guidelines (Cypher 2002). All plant species encountered during the field surveys were identified to subspecies or variety, if applicable, to determine sensitivity status. If target species were encountered, field personnel recorded data points demarcating the edge of the polygon and assessed population numbers using the Esri ArcGIS mobile application.

Table 2. Summary of Focused Special-Status Plant Survey Personnel and Conditions

| Date | Time | Personnel | Weather Conditions |
|----------|-----------|---------------|---|
| 5/9/2022 | 1204–1755 | Heather Moine | 58°F to 64°F, 10–70% cloud cover, 1–6 mile per hour winds |

3.2.3 Tree Survey Verification

Dudek ISA Certified and Tree Risk Assessment Qualified Arborist, Ryan Allen (WE-10316A), performed a tree survey on May 12, 2022, as shown in Table 3, to confirm the accuracy of the Landmark Tree and Oak Tree Report (Appendix A) and to locate and identify any additional trees protected by the City of Thousand Oak's tree ordinances with any portion of their canopy dripline within the Project site. Individual trees were assessed to confirm information (e.g. field location, species identification, health assessment) included in the Landmark Tree and Oak Tree Report (Appendix A) and/or documented for additional protected trees. The May 12, 2022, tree survey included verifying

that the L. Newman Design Group, Inc. 2022 Landmark Tree and Oak Tree Report accurately represents the location, species, size, and health condition of the trees on-site. No additional landmark or protected oak trees were observed on site.

Table 3. Summary of Tree Survey Verification Personnel and Conditions

| Date | Time | Personnel | Weather Conditions |
|-----------|-----------|-------------|---|
| 5/12/2022 | 0800–0900 | Ryan Allen* | 72 °F to 75 °F, 0% cloud cover, 1–3 mile per hour winds |

* International Society of Arboriculture Certified Arborist who is also Tree Risk Assessment Qualified

3.2.4 Aquatic Resources Delineation

Based on the reconnaissance-level biological survey, Dudek biologist Heather Moine identified areas with aquatic resources within the northeastern and eastern portion of the site. As the initial step of the aquatic resources delineation, the Dudek biologist conducted a literature review of publicly available sources documenting known or potential aquatic resources within the survey area and in the local vicinity. These included National Wetland Inventory (USFWS 2022c), the National Hydrography Dataset (USGS 2022), and historical aerial images. Following the literature review, the Dudek biologist surveyed the Project site to delineate aquatic features and determine the extent of potentially jurisdictional aquatic resources. The aquatic resources delineation was conducted in accordance with the procedures established in the Corps of Engineers Wetlands Delineation Manual (USACE Environmental Laboratory 1987) and the Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Arid West Region (USACE Environmental Laboratory 2008a). In the absence of wetlands, the limits of USACE jurisdiction in non-tidal waters, such as intermittent streams, extend to the ordinary high water mark (OHWM) (33 CFR 328.3[e]), the delineation of which follows A Field Guide to the Identification of the Ordinary High Water Mark (OHWM) in the Arid West Region of the Western United States (USACE Environmental Laboratory 2008b). The aquatic resources delineation also included the collection of CDFW jurisdictional boundaries subject to Sections 1600–1616 of the California Fish and Game Code, which extend to the top of bank or the outermost edge of riparian vegetation, whichever is greater, associated with a stream channel or waterway. Lastly, the aquatic resources delineation included an evaluation of swales. The Dudek biologist conducted the aquatic resources delineation in May 2022, as shown in Table 4.

Table 4. Summary of Aquatic Resource Delineation Personnel and Conditions

| Date | Time | Personnel | Weather Conditions |
|----------|-----------|---------------|---|
| 5/9/2022 | 1204–1755 | Heather Moine | 58 °F to 64 °F, 10–70% cloud cover, 1–6 mile per hour winds |

3.2.5 Limitations

No protocol surveys or guidelines developed by responsible or trustee agency (e.g., USFWS, USACE, CDFW) were not conducted as part of this of the biological survey. The seasonal timing of the of survey precluded the observation of many wildlife species not active or evident time of year the survey occurred. Additionally, no agencies were consulted regarding aquatic resources or special-status species; therefore, the conclusions and recommendations are based on the best available information including literature, databases, and the field surveys performed.

4 Results

The Project site is dominated by urban/developed and landscape plantings with native habitats, including one sensitive vegetation community—*Encelia californica* shrubland alliance (i.e., California brittle bush scrub)—occurring in the north and northeast portions of the site. No special-status plant species or special-status wildlife species were observed; however, the trees and shrubs provide nesting bird habitat. A total of 77 protected trees including California sycamore (*Platanus racemosa*), coast live oak (*Quercus agrifolia*), holly oak (*Quercus ilex*), and cork oak (*Quercus suber*) were documented throughout the Project site (see Appendix A, Landmark Tree and Oak Tree Report). There is no USFWS critical habitat within the Project site and due to the developed nature of the site and surrounding areas and the site lacks wildlife corridors. The existing trees and shrubs provide habitat for migratory birds and the Project site is along migratory bird routes which birds may pass over during the day or night.

4.1 Vegetation Communities and Land Cover Types

The CNDDDB query (CDFW 2022) returned five sensitive vegetation communities documented within a 5-mile buffer of the Project, as shown in Figure 2, Literature Review Results. Southern coast live oak riparian forest was documented approximately 4.5 miles to the east, east of State Route 23 along Arroyo Conejo. Southern riparian forest was documented approximately 0.6 miles to the north along Arroyo Conejo. Southern sycamore alder riparian woodland was documented approximately 0.4 miles to the east along Arroyo Conejo. Valley needlegrass grassland was documented approximately 3.2 miles to the southwest, south of U.S. Highway 101 near Via las Brisas. Valley oak woodland was documented approximately 1.5 miles to the southeast, south of U.S. Highway 101 near North Lynn Road.

The Project site is dominated by landscaped vegetation and impervious surfaces including buildings and parking lot surfaces. A total of four general cover categories consisting of eight vegetation communities and land cover types were mapped during the field survey, as shown in Table 5, Summary of Vegetation Communities and Land Cover Types, Figure 3, Biological Resources, and Appendix B, Photograph Log.

There are scattered coast live oak (*Quercus agrifolia*), holly oak (*Quercus ilex*), and cork oak (*Quercus suber*) individuals throughout the Project site. Although some of the oak trees occur in small groupings, they were not determined to be an oak woodland or oak savannah due to the spacing among trees and urban setting. Additionally, the Thousand Oaks General Plan Conservation Element (City of Thousand Oaks 2013) states the following:

Southern Oak Woodland/Oak Savannah: Southern oak woodlands and savannahs primarily occur in gently rolling foothills and valleys. Valley oaks usually form a savannah comprised of large wide-spaced trees separated by extensive grasslands. This plan community is present within the Planning Area but in its undisturbed form is limited to small geographic areas. While the City's Oak Tree Ordinance has enabled many of the individual historic oaks to be protected as development took place, the only remaining examples of southern oak woodlands and savannahs with their associated plants are within public open space. Southern oak woodlands and savannahs support a wide variety of bird and animal species wherever they occur.

The coast live oak, holly oak, and cork oak individuals are discussed as individual trees in Section 4.3, Trees. Additionally, the California sycamore (*Platanus racemosa*) individuals are discussed as individual trees in Section 4.3.

Table 5. Summary of Vegetation Communities and Land Cover Types

| Vegetation Community/ Land Cover Type | State Rarity Ranking | Area (acres) |
|---|----------------------|--------------------------|
| Riparian | | |
| <i>Baccharis salicifolia</i> Alliance | S4 | 0.08 |
| Scrub | | |
| <i>Artemisia californica</i> - <i>Lotus scoparius</i> Association | N | 0.24 |
| <i>Encelia californica</i> Alliance | S3 | 0.45 |
| <i>Lotus scoparius</i> Alliance | S5 | 0.12 |
| Grass and Herb Dominated | | |
| <i>Hirschfeldia incana</i> Provisional Semi-Natural Association | SNA | 0.04 |
| Disturbed and Developed | | |
| Disturbed Habitat | NA | 1.63 |
| Landscape Plantings | NA | 2.45 |
| Urban/Developed and Landscape Plantings | NA | 13.90 |
| Total | | 18.90^a |

Notes:

^a Assessor's GIS parcel base was used to calculate acreages, which represents a best fit of surveyed property boundaries; therefore, there is minor discrepancy in the total acres.

N = no. Not identified as sensitive in A Manual of California Vegetation (Sawyer et al. 2009) or California Natural Community List (CDFW 2021a).

NA = not applicable. Not identified in A Manual of California Vegetation (Sawyer et al. 2009) or California Natural Community List (CDFW 2021a); therefore, there is no sensitivity status.

S3 = Vulnerable, sensitive. At moderate risk of extirpation in the jurisdiction due to a fairly restricted range, relatively few populations or occurrences, recent widespread declines, threats, or other factors.

S4 = Apparently secure, not sensitive. At a fairly low risk of extirpation in the jurisdiction due to an extensive range and/or many population occurrences, but with possible cause for some concern as a result of local recent declines, threats, or other factors.

S5 = secure, not sensitive. At a very low risk of extirpation in the jurisdiction due to a very extensive range, abundant populations or occurrences, with little to no concern from declines or threats.

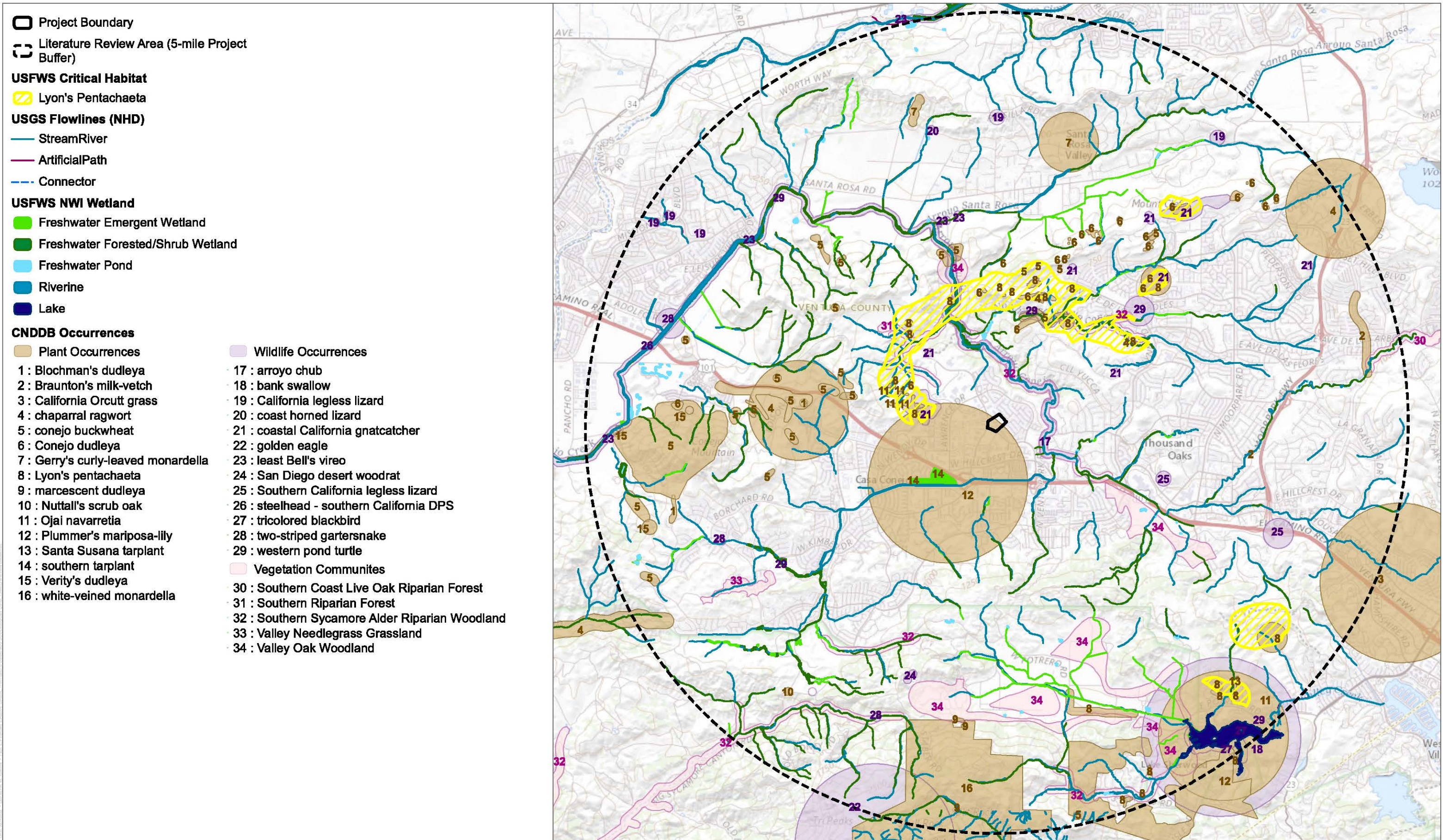
SNA = Semi-natural association. Associated with a non-native plant; therefore, there is not sensitivity status.

4.1.1 Riparian

Baccharis salicifolia Alliance

The *Baccharis salicifolia* alliance (i.e., mulefat thickets) includes mulefat as the dominant or co-dominant species in the shrub canopy. Mulefat thickets have a continuous shrub canopy less than 5 meters (16 feet) in height. The herbaceous layer is sparse. Mulefat thickets occur on both seasonally and intermittently flooded habitats, and these stands are inherently variable based on seasonal inundation and scouring (Sawyer et al. 2009).

Mulefat thickets occur in one patch in the northeastern portion of the Project site, as shown on Figure 3. Mulefat is greater than 50% relative cover in the shrub canopy. Other species observed include coyote brush (*Baccharis pilularis*), tree tobacco (*Nicotiana glauca*), and shortpod mustard (*Hirschfeldia incana*). Upon review of historic aerial imagery, this area currently dominated by mulefat thickets was cleared and void vegetation regularly and most recently in 2019 (Google Earth 2022). Mulefat thickets comprise 0.08 acres of the Project site.



SOURCE: ESRI World Imagery

FIGURE 2
Literature Review Results
1100 Rancho Conejo

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SOURCE: ESRI World Imagery

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The *Baccharis salicifolia* alliance (i.e., mulefat thickets) is ranked as an S4 alliance (CDFW 2021a). This ranking indicates that within California the alliance is apparently secure and not considered a sensitive vegetation community (CDFW 2021a). Mulefat is often riparian habitat associated with aquatic resources. Subsequent to the reconnaissance-level biological survey, this area was revisited during the aquatic resources delineation as further discussed in Section 4.7, Aquatic Resources.

4.1.2 Scrub

Artemisia californica - *Lotus scoparius* Association

Artemisia California shrubland alliance (i.e., California sagebrush scrub) is the alliance in which *Artemisia californica* - *Lotus scoparius* association (i.e., California sagebrush - deer weed) is included as an association. The *Artemisia californica* - *Lotus scoparius* association (i.e., California sagebrush - deer weed) includes California sagebrush as the dominant or co-dominant species in the shrub canopy with deer weed as an associated species. The scrub canopy observed has an intermittent shrub canopy that includes shrubs less than 1 meter (3 feet) in height. The herbaceous layer is variable both seasonally and annually. California sagebrush scrub is usually found on steep slopes that are rarely flooded and on low-gradient deposits along streams (Sawyer et al. 2009).

California sagebrush - deer weed occurs in one patch in the northeastern portion of the Project site, as shown in Figure 3. California sagebrush is greater than 50% relative cover in the shrub canopy with associated deer weed. Upon review of historic aerial imagery, this area currently dominated by California sagebrush - deer weed was cleared and void of shrubs between 2007 and 2011 (Google Earth 2022). During the May 2022 site surveys, disturbance including mowing was observed within the California sagebrush - deer weed habitat. An irrigation system was observed which may indicate a sort of plant establishment effort. California sagebrush - deer weed comprises 0.24 acres of the Project site.

The *Artemisia californica* - *Lotus scoparius* association (i.e., California sagebrush - deer weed) is not considered a sensitive vegetation community (CDFW 2021a).

Encelia californica Alliance

The *Encelia californica* shrubland alliance (i.e., California brittle bush scrub) includes California brittle bush as the dominant or co-dominant species in the shrub canopy with an intermittent to continuous shrub canopy that includes shrubs less than 1 meter (3 feet) in height. The herbaceous layer is variable. California brittle bush is usually found on sunny, steep slopes that are often rocky or eroded (Sawyer et al. 2009).

California brittle bush scrub occurs in one patch in the eastern portion of the Project site, as shown in Figure 3. California brittle bush is greater than 30% relative cover in the shrub canopy. Other species observed include coyote brush and quailbush (*Atriplex lentiformis*). During the May 2022 site surveys, an irrigation system was observed adjacent to the California brittle bush which may indicate a sort of plant establishment effort. California brittle bush comprises 0.45 acres of the Project site.

The *Encelia californica* shrubland alliance (i.e., California brittle bush scrub) is ranked as an S3 alliance (CDFW 2021a). This ranking indicates that within California the alliance is vulnerable and considered a sensitive vegetation community (CDFW 2021a).

Lotus scoparius Alliance

The *Lotus scoparius* alliance (i.e., deerweed scrub) includes deer weed as the dominant species in the shrub canopy with an intermittent shrub canopy that includes shrubs less than 1 meter (3 feet) in height. The herbaceous layer is sparse to intermittent. Deer weed is usually found on lower to upper slopes and ridges, typically exposed, somewhat steep open settings or areas often with recent disturbance, such as through clearing, fire, or intermittent flooding (Sawyer et al. 2009).

Deer weed occurs in one patch in the northeastern portion of the Project site, as shown in Figure 3. Deer weed is greater than 50% relative cover in the shrub canopy. Upon review of historic aerial imagery, this area currently dominated by deer weed was cleared and void of shrubs between 2007 and 2011 (Google Earth 2022). During the May 2022 site surveys, an irrigation system was observed which may indicate a sort of plant establishment effort. Deer weed comprises 0.12 acres of the Project site.

The *Lotus scoparius* alliance (i.e., deerweed scrub) is ranked as an S5 alliance (CDFW 2021a). This ranking indicates that within California the alliance is secure and not considered a sensitive vegetation community (CDFW 2021a).

4.1.3 Grass and Herb Dominated

Hirschfeldia incana Provisional Semi-Natural Association

The *Hirschfeldia incana* provisional semi-natural association (i.e., shortpod mustard) includes shortpod mustard as the dominant species in the herbaceous layer with intermittent cover. Shortpod mustard is usually found in fallow fields, rangelands, grasslands, roadsides, levee slopes, disturbed coastal scrub, riparian areas, cleared roadsides, and waste places (Sawyer et al. 2009).

Shortpod mustard occurs in one patch in the eastern portion of the Project site, as shown in Figure 3. Short pod mustard is dominant with other non-native plant species including bird's-foot trefoil (*Lotus corniculatus*), petty spurge (*Euphorbia peplus*), and spiny sowthistle (*Sonchus asper*). Upon review of historic aerial imagery, this area currently dominated by shortpod mustard was regularly disturbed including vegetation clearance (Google Earth 2022). Shortpod mustard comprises 0.04 acres of the Project site.

The *Hirschfeldia incana* provisional semi-natural association (i.e., shortpod mustard) is a non-native plant species and is not considered a sensitive vegetation community (CDFW 2021a).

4.1.4 Disturbed and Developed

Disturbed Habitat

Disturbed habitat consists of the areas that have experienced physical anthropogenic disturbance, and as a result cannot be identified as native or naturalized vegetation communities. There can also be impacts from animal uses, grading, or repeated clearing for fuel management on disturbed lands, which leave the land incapable of providing a suitable or sustainable habitat in which native species can persist. Disturbed habitat occurs within the eastern portion of the Project site comprises 1.63 acres.

Disturbed habitat is not identified in A Manual of California Vegetation (Sawyer et al. 2009) or California Natural Community List (CDFW 2021a); therefore, there is no sensitivity status.

Landscape Plantings

Landscape plantings include areas where native plant species, non-native ornamental plant species, and landscaping schemes have been installed and maintained, usually part of commercial or residential property/park. This habitat type typically supports myriad ornamental species. Within the Project site, landscape plantings areas include plants both installed and rooted in the ground and in containers such as tree boxes. Landscape plantings occur within the eastern portion of the Project site and comprise 2.45 acres.

Landscape plantings is not identified in A Manual of California Vegetation (Sawyer et al. 2009) or California Natural Community List (CDFW 2021a); therefore, there is no sensitivity status. There are some protected tree species that occur within the landscape plantings areas and these tree individuals are discussed in Section 4.3.

Urban/Developed and Landscape Plantings

Urban/developed represents areas that have been constructed upon or otherwise have been physically altered to an extent that vegetation communities are not supported. The portions of the Project site characterized as developed consists of existing buildings and associated parking surfaces.

Landscape plantings include areas where native plant species, non-native ornamental plant species, and landscaping schemes have been installed and maintained, usually part of commercial or residential property/park. This habitat type typically supports myriad ornamental species. Urban/developed and landscape plantings dominate the Project site and occur within the western and central portions of the Project site and comprise 13.90 acres.

Urban/developed and landscape plantings is not identified in A Manual of California Vegetation (Sawyer et al. 2009) or California Natural Community List (CDFW 2021a); therefore, there is no sensitivity status. There are some protected tree species that occur within the urban/developed and landscape plantings areas and these tree individuals are discussed in Section 4.3.

4.2 Plant Species

The CNDDDB (CDFW 2022), CNPS (2022), and IPaC (USFWS 2022a) literature and database views resulted in 27 special-status plant species that have been documented within a 5-mile buffer of the Project (Figure 2). Based on Dudek's habitat suitability analysis, none of the 25 special-status plant species are expected to occur based on lack of suitable vegetation and being outside of species' known elevation range. Appendix C, Plant Species Not Expected to Occur, includes a table of the 25 special-status plant species and their potential to occur based on documented occurrences and site conditions.

During the May 2, 2022, reconnaissance-level biological survey and May 9, 2022, focused special-status plant survey, a total of 119 plant species were documented, as shown in Appendix D, Plant Species Compendium. In all, 33 (28%) were native and 86 (72%) were non-native. No special-status plant species were observed.

Dominant plant species observed included non-native ornamental plant species within the landscaped areas of the industrial park portions of the Project site and California sagebrush (*Artemisia californica*), deer weed (*Acmispon glaber*), and California brittle bush (*Encelia californica*) along the slopes in the northern and eastern slopes. The native habitats in the north and east are isolated from larger native vegetation areas, are surrounded by development, and signs of disturbance were observed including vegetation removal (mowing or weed whipping) and encroachment from landscaping maintenance.

Upon review of historic aerial imagery, the areas in the north and northeast dominated by California sagebrush and deer weed was cleared and void of shrubs between 2007 and 2011 (Google Earth 2022). During the May 2022 site surveys, an irrigation system was observed in this area which may indicate a sort of plant establishment effort. The eastern slope of the Project site is dominated by California brittle bush with a continuous canopy with few herbaceous species observed beneath the canopy and a diversity of plant species occurring along the outer boundary of the California brittle bush. During the May 2022 site surveys, an irrigation system was observed in this area which may indicate a sort of plant establishment effort.

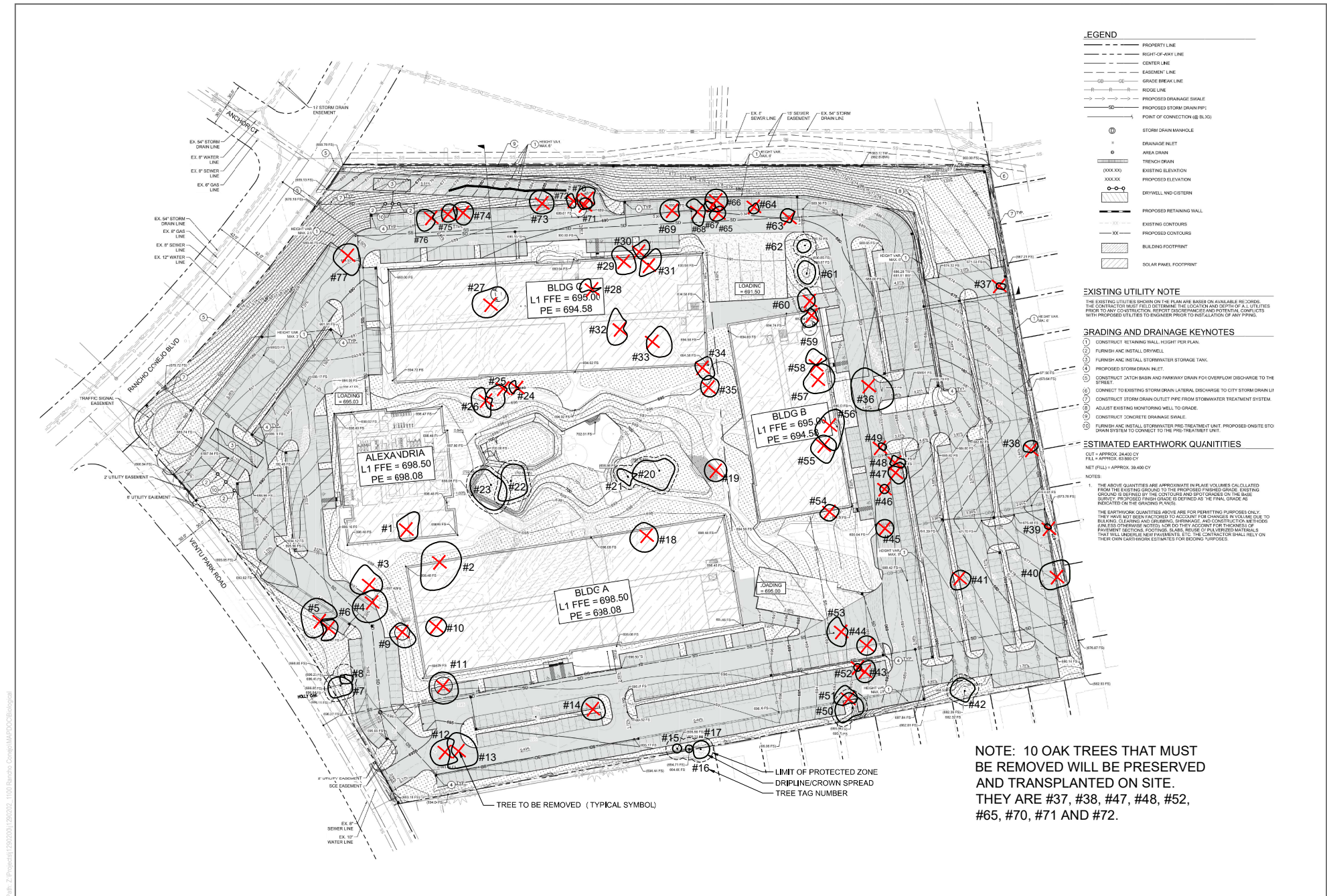
4.3 Trees

There are 77 protected trees dispersed throughout the Project site, as shown in Figure 4, Protected Tree Locations. The 77 protected trees are represented by 4 tree species as depicted in Table 6, Summary of Protected Tree Species.

Table 6. Summary of Protected Tree Species

| Tree Species | | | |
|--------------------------|---------------------|-----------------|------------|
| Scientific Name | Common Name | Number of Trees | Percentage |
| <i>Platanus racemosa</i> | California sycamore | 27 | 35% |
| <i>Quercus agrifolia</i> | coast live oak | 43 | 56% |
| <i>Quercus ilex</i> | holly oak | 4 | 5% |
| <i>Quercus suber</i> | cork oak | 3 | 4% |
| Total | | 77 | 100% |

Of the total, 77 trees are single-stemmed and 18 are multi-trunked trees. Tree diameters for single-stemmed trees varied from tree to tree and ranged from 4 to 38 inches, and cumulative trunk diameters for multi-trunked trees ranged from 9 to 57 inches. Average tree heights and canopy widths ranged from 8 to 70 feet tall and extended 8 to 60 feet at their widest points. The Summary of Field Observations table and Dripline Measurements in Appendix A, Landmark Tree and Oak Tree Report, provides tree height and attribute information for each oak tree and landmark tree on the Project site.



SOURCE: Kimley Horn 2022

DUDEK

FIGURE 4
Protected Tree Locations
 1100 Rancho Conejo

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4.4 Wildlife Species

The CNDDDB (CDFW 2022) and IPaC (USFWS 2022a) literature and database views resulted in 17 special-status wildlife species that have been documented within a 5-mile buffer the Project (Figure 2). Based on Dudek's habitat suitability analysis, none of the 17 special-status wildlife species are expected to occur based on lack of suitable habitat, disturbed nature of the habitats present, and the habitats being isolated and surrounded by development. Appendix E, Wildlife Species Not Expected to Occur, includes a table of the 17 special-status wildlife species and their potential to occur.

During the May 2, 2022, reconnaissance-level biological survey, a total of 12 wildlife species were documented within the landscape plantings and native habitats within the northern and eastern portions of the site, as shown in Appendix F, Wildlife Species Compendium. The 10 bird species—house finch (*Haemorhous mexicanus*), lesser goldfinch (*Spinus psaltria*), Anna's hummingbird (*Calypte anna*), American crow (*Corvus brachyrhynchos*), northern mockingbird (*Mimus polyglottos*), house sparrow (*Passer domesticus*), mourning dove (*Zenaida macroura*), Bewick's wren (*Thryomanes bewickii*), dark-eyed junco (*Junco hyemalis*), and spotted towhee (*Pipilo maculatus*)—one mammal species—brush rabbit (*Sylvilagus bachmani*)—and one reptile species—western fence lizard (*Sceloporus occidentalis*)—are common to the Thousand Oaks area and are not special-status species. These bird species and others common to the area have potential to nest in the existing trees and shrubs at the Project site.

4.5 Critical Habitat

A query of the IPaC (USFWS 2022a) and review of the critical habitat mapper (USFWS 2022b) indicated that there is coastal California gnatcatcher (*Polioptila californica californica*) and Lyon's pentachaeta (*Pentachaeta lyonii*) critical habitat within 5 miles of the Project site; however, no critical habitat is within the Project site (Figure 2).

4.6 Wildlife Corridors and Habitat Linkages

Wildlife corridors are linear features that connect large patches of natural open space and provide avenues for dispersal or migration of animals and dispersal of plants (e.g., via wildlife vectors). Wildlife corridors contribute to population viability by ensuring continual exchange of genes between populations, which helps maintain genetic diversity.

Habitat linkages are small patches that join larger blocks of habitat and help reduce the adverse effects of habitat fragmentation. They serve as connections between habitat patches and help reduce the adverse effects of habitat fragmentation. Although individual animals may not move through a habitat linkage, the linkage is a potential route for gene flow and long-term dispersal. Habitat linkages may serve both as habitat and avenues of gene flow for small animals such as reptiles, amphibians, and rodents. Habitat linkages may be represented by continuous patches of habitat or by nearby habitat "islands" that function as stepping-stones for dispersal and movement (especially for birds and flying insects). Wildlife corridors and habitat linkages provide avenues for dispersal or migration of animals that also contribute to population viability in several ways, including the following:

- Ensuring continual exchange of genes between populations to aid in maintaining genetic diversity
- Providing habitat for some species
- Providing access to adjacent habitat areas representing additional territory for foraging and mating

- Allowing for a greater carrying capacity
- Providing routes for colonization of habitat lands following local population extinctions or habitat recovery from ecological catastrophes

The Project site is situated in highly urbanized Thousand Oaks and does not contribute to the existence of a wildlife corridor for several reasons. Specifically, the Project site is currently developed with commercial buildings and a parking lot dominated by impervious surfaces and surrounded by commercial and residential buildings. Any wildlife moving through the Project site would either be avian species or very small mammals or reptiles. Larger wildlife species seeking to pass through the region are likely traveling along the riparian habitats of Arroyo Conejo (approximately 0.4 miles to the east of the Project site) and the Conejo Mountains and associated open space areas (approximately 0.6 miles to the west of the Project site). However, areas between the Project site and Arroyo Conejo and the Conejo Mountains are highly urbanized reducing the ability of larger wildlife accessing the Project site. Lastly, the Project site lacks streams, canyons, or similar topography that are commonly used by larger wildlife and that would facilitate wildlife movement. Additionally, the Conservation Element of the Thousand Oaks General Plan (City of Thousand Oaks 2013), Figure 2, Biological Resources, does not identify vegetation communities or wildlife corridors through the Project site.

The existing trees and shrubs provide habitat for migratory birds and the Project site is along migratory bird routes which birds may pass over during the day or night.

4.7 Aquatic Resources

Three areas (Areas 1, 2, and 3) were assessed to see if they are a regulated aquatic resource (i.e., wetland or stream). After review, none of the three areas were found to include an aquatic resource per the three-criteria wetland definition of the USACE or contain stream features per USACE OHWM indicators. All potential aquatic resources are displayed on Figure 5, Aquatic Resources. Appendix G contains Wetland Determination Data Forms and Appendix H contains Ordinary High Water Mark Data Sheets for each area.

The Project site is located within the Calleguas Hydrologic Unit, specifically the Calleguas-Conejo Hydrologic Area and Conejo Valley Hydrologic Sub-Area, as defined in the Water Quality Control Plan (also referred to as the Basin Plan) for the Los Angeles Basin (RWQCB 2014).

A query of the USFWS National Wetland Inventory (USFWS 2022c) and U.S. Geological Survey's National Hydrography Dataset (USGS 2022) databases resulted in no aquatic resource within Project site, as shown in Figure 3. The nearest daylighted aquatic resources are Arroyo Conejo (approximately 0.4 miles to the east of the Project site) and trapezoidal concrete lined South Branch Arroyo Conejo (approximately 0.6 miles to the south of the Project site).

These potential aquatic resources consisted of areas with lowered topography, dominated by mulefat, and/or surface soil cracks. A total of three areas were assessed for potential aquatic resources.



SOURCE: NAIP 2020

FIGURE 5
Aquatic Resources
1100 Rancho Conejo

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4.7.1 Area 1

Area 1 is dominated by mulefat and surface soil cracks were observed; but, the soils were not found to be hydric, the area lacks hydrophytic vegetation, and lacks OHWM indicators; therefore, Area 1 is not a wetland or an aquatic resource (Appendix G, Wetland Determination Data Forms, and Appendix H, Ordinary High Water Mark Data Sheets).

Vegetation

Four hydrophytic plant species were observed and recorded within Area 1; mulefat (Facultative [FAC]), bird's-foot trefoil (*Lotus corniculatus*; FAC), scarlet pimpernel (*Lysimachia arvensis*; FAC), and tree tobacco (*Nicotiana glauca*; FAC). Area 1 also supported upland adapted plant species, as shown in Table 7. Upon review of historic aerial imagery, this area currently dominated by mulefat thickets was cleared and void vegetation regularly and most recently in 2019 (Google Earth 2022). Based on the vegetation observed and documented on the wetland determination data form (SP-01) including the plant species present, percent cover, dominance, and indicator status it was determined that the vegetation is not hydrophytic, as seen in Appendix G.

Table 7. Area 1 Plant Species List and their Indicator Status

| Scientific Name | Common Name | Indicator Status ¹ |
|------------------------------|----------------------|-------------------------------|
| <i>Baccharis pilularis</i> | coyote brush | Not Listed |
| <i>Baccharis salicifolia</i> | mulefat | FAC |
| <i>Centaurea melitensis</i> | Maltese star-thistle | Not Listed |
| <i>Erigeron bonariensis</i> | asthmaweed | FACU |
| <i>Erodium cicutarium</i> | redstem stork's bill | Not Listed |
| <i>Euphorbia peplus</i> | petty spurge | Not Listed |
| <i>Hirschfeldia incana</i> | shortpod mustard | Not Listed |
| <i>Kickxia elatine</i> | sharpleaf cancerwort | UPL |
| <i>Lotus corniculatus</i> | bird's-foot trefoil | FAC |
| <i>Lysimachia arvensis</i> | scarlet pimpernel | FAC |
| <i>Nicotiana glauca</i> | tree tobacco | FAC |

Notes:

¹ National Wetland Plant List, Arid West (USACE 2020)

FAC = Facultative. Equally likely to occur in wetlands and non-wetlands (Lichvar et al. 2012)

FACU = Facultative Upland. Usually occurs in non-wetlands but occasionally found in wetlands (Lichvar et al. 2012)

Not Listed = not listed in the National Wetland Plant List Indicator Rating Definitions (Lichvar et al. 2012)

UPL = Upland. Occur in wetlands in another region, but occur almost always under natural conditions in non-wetlands in the region specified (Lichvar et al. 2012)

Soils

A soil pit was excavated to a depth of 10 inches. Based on the soil observed and documented on the wetland determination data form (SP-01) including soil matrix color and redox features color, percent, type, and location it was determined that soils are not hydric, as seen in Appendix G.

Hydrology

Surface soil cracks, a primary indicator of wetland hydrology, were observed at SP-01 and recorded on the wetland determination data form. No surface water, water table, or saturation were observed. Based on the presence of surface soil cracks, it was determined that there is wetland hydrology present, as seen in Appendix G.

Ordinary High Water Mark

The majority of the Project site is at an elevation higher than the northeaster and eastern portions of the site and Area 1 is adjacent to the toe of slope in the northeastern portion of the site. Area 1 (Transect ID: Transect-NA-HLM-01) has a slight topographic depression and gradually slopes towards the north and northeast corner of the Project site; however, no OHWM indicators or swales were observed, as seen in Appendix H.

Area 1 Results Summary

Area 1 is dominated by mulefat and surface soil cracks (primary hydrology indicator) were observed; however, the area lacks hydrophytic vegetation and the soils were not found to be hydric. Additionally, the area lacks OHWM indicators; therefore, Area 1 is not a wetland or an aquatic resource (Appendix G and Appendix H).

4.7.2 Area 2

Area 2 is dominated by bird's-foot trefoil (FAC) and shortpod mustard (Not Listed), no wetland criterion was observed, and the area lacks OHWM indicators; therefore, Area 2 is not a wetland or an aquatic resource (Appendix G and Appendix H).

Area 2 can be seen on aerial imagery as having a differing darker vegetation color from the surrounding areas. To document the potential wetlands and the topography of the area, a wetland determination data form (SP-02) and an OHWM data sheet (Transect-NA-HLM-02) were recorded for this area, as shown in Figure 5, Appendix G, and Appendix H.

Vegetation

Four hydrophytic plant species were observed and recorded within Area 2; mulefat (FAC), bristly oxtongue (*Helminthotheca echinoides*; FAC) bird's-foot trefoil (FAC), and scarlet pimpernel (FAC). Area 2 also supported upland adapted plant species, as shown in Table 8. Based on the vegetation observed and documented on the wetland determination data form (SP-02) including the plant species present, percent cover, dominance, and indicator status it was determined that the vegetation is not hydrophytic, as seen in Appendix G.

Table 8. Area 2 Plant Species List and their Indicator Status

| Scientific Name | Common Name | Indicator Status ¹ |
|----------------------------------|---------------------------|-------------------------------|
| <i>Baccharis salicifolia</i> | mulefat | FAC |
| <i>Carduus pycnocephalus</i> | Italian plumeless thistle | Not Listed |
| <i>Centaurea melitensis</i> | Maltese star-thistle | Not Listed |
| <i>Erodium cicutarium</i> | redstem stork's bill | Not Listed |
| <i>Helminthotheca echinoides</i> | bristly oxtongue | FAC |
| <i>Hirschfeldia incana</i> | shortpod mustard | Not Listed |
| <i>Lactuca serriola</i> | prickly lettuce | FACU |

Table 8. Area 2 Plant Species List and their Indicator Status

| Scientific Name | Common Name | Indicator Status ¹ |
|----------------------------|---------------------|-------------------------------|
| <i>Lotus corniculatus</i> | bird's-foot trefoil | FAC |
| <i>Lysimachia arvensis</i> | scarlet pimpernel | FAC |
| <i>Quercus agrifolia</i> | coast live oak | Not Listed |

Notes:¹ National Wetland Plant List, Arid West (USACE 2020)

FAC = Facultative. Equally likely to occur in wetlands and non-wetlands (Lichvar et al. 2012)

FACU = Facultative Upland. Usually occurs in non-wetlands but occasionally found in wetlands (Lichvar et al. 2012)

Not Listed = not listed in the National Wetland Plant List Indicator Rating Definitions (Lichvar et al. 2012)

Soils

No soil pit was excavated since no hydrophytic vegetation or hydrology were observed.

Hydrology

Drainage patterns, a secondary indicator of wetland hydrology, were observed at SP-02 and recorded on the wetland determination data form. No surface water, water table, or saturation were observed. Based on the lack of primary wetland hydrology indicators and/or two or more secondary wetland hydrology indicators, it was determined that there is no wetland hydrology present, as seen in Appendix G.

Ordinary High Water Mark

The majority of the Project site is at an elevation higher than the northeaster and eastern portions of the site and Area 2 is adjacent to the toe of slope in the northeastern portion of the site. Area 2 (Transect ID: Transect-NA-HLM-02) has a slight topographic depression and gradually slopes towards the northern corner of the Project site where dilapidated sandbags are located and there appears to be an aquatic resource outside the Project site to the north. There is a culvert at the toe of slope that appears to drain water from the developed portions of the site; however, no OHWM indicators or swales were observed, as seen in Appendix H.

Area 2 Results Summary

Area 2 is dominated by bird's-foot trefoil (FAC) and shortpod mustard (Not Listed); however, the area lacks hydrophytic vegetation and wetland hydrology. Additionally, the area lacks OHWM indicators; therefore, Area 2 is not a wetland or an aquatic resource (Appendix G and Appendix H).

4.7.3 Area 3

Area 3 is dominated by landscape trees no wetland criterion was observed, and the area lacks OHWM indicators; therefore, Area 3 is not a wetland or an aquatic resource (Appendix G and Appendix H).

Area 3 is along the northeastern boundary of the site. To document the potential wetlands and the topography of the area, a wetland determination data form (SP-03) and two OHWM data sheet (Transect-USW-HLM-01 and Transect-USW-HLM- 2) were recorded for this area, as shown in Figure 5, Appendix G and Appendix H.

Vegetation

Four hydrophytic plant species were observed and recorded within Area 3; tall flatsedge (*Cyperus eragrostis*; Facultative Wetland), bristly oxtongue (*Helminthotheca echioides*; FAC), scarlet pimpernel (FAC), and curly dock (*Rumex crispus*;

FAC). Area 3 also supported upland adapted plant species, as shown in Table 9. Based on the vegetation observed and documented on the wetland determination data form (SP-03) including the plant species present, percent cover, dominance, and indicator status it was determined that the vegetation is not hydrophytic, as seen in Appendix G.

Table 9. Area 3 Plant Species List and their Indicator Status

| Scientific Name | Common Name | Indicator Status ¹ |
|---------------------------------|---------------------------|-------------------------------|
| <i>Carduus pycnocephalus</i> | Italian plumeless thistle | Not Listed |
| <i>Cyperus eragrostis</i> | tall flatsedge | FACW |
| <i>Erodium cicutarium</i> | redstem stork's bill | Not Listed |
| <i>Euphorbia peplus</i> | petty spurge | Not Listed |
| <i>Helminthotheca echioides</i> | bristly oxtongue | FAC |
| <i>Kickxia elatine</i> | sharp-leaf cancerwort | UPL |
| <i>Lactuca serriola</i> | prickly lettuce | FACU |
| <i>Lysimachia arvensis</i> | scarlet pimpernel | FAC |
| <i>Rumex crispus</i> | curly dock | FAC |
| <i>Sonchus oleraceus</i> | common sowthistle | UPL |

Notes:

¹ National Wetland Plant List, Arid West (USACE 2020)

FAC = Facultative. Equally likely to occur in wetlands and non-wetlands (Lichvar et al. 2012)

FACU = Facultative Upland. Usually occurs in non-wetlands but occasionally found in wetlands (Lichvar et al. 2012)

FACW = Facultative Wetland. Usually occur in wetlands but occasionally found in non-wetlands (Lichvar et al. 2012)

Not Listed = not listed in the National Wetland Plant List Indicator Rating Definitions (Lichvar et al. 2012)

UPL = Upland. Occur in wetlands in another region, but occur almost always under natural conditions in non-wetlands in the region specified (Lichvar et al. 2012)

Soils

No soil pit was excavated ins no hydrophytic vegetation or hydrology were observed.

Hydrology

Drainage patterns, a secondary indicator of wetland hydrology, were observed at SP-03 and recorded on the wetland determination data form. No surface water, water table, or saturation were observed. Based on the lack of primary wetland hydrology indicators and/or two or more secondary wetland hydrology indicators, it was determined that there is no wetland hydrology present, as seen in Appendix G.

Ordinary High Water Mark

Area 3 (Transect ID: Transect-USW-HLM-01 and Transect-USW-HLM-02) is along the northeastern boundary of the site and gradually slopes towards the northern corner of the Project site where dilapidated sandbags are located and there appears to be an aquatic resource outside the Project site to the north. There is no obvious source of water for Area 3; however, it does have lower topography. No OHWM indicators were observed; however, two disconnected, upland ephemeral swales were observed. USW-HLM-01 is approximately 354 feet in length with an approximate width of 1 foot and approximate depth of 6 inches. USW-HLM-02 is approximately 187 feet in length with an approximate width of 1 foot and approximate depth of 6 inches, as shown on Figure 5 and Appendix H.

Area 3 Results Summary

Area 3 is dominated by landscape vegetation and lacks hydrophytic vegetation and wetland hydrology. Additionally, the area lacks OHWM indicators; therefore, Area 3 is not a wetland or an aquatic resource (Appendix G and Appendix H).

5 Conclusions and Recommendations

5.1 Vegetation Communities and Land Cover Types

As discussed in Section 4.1, four native riparian and scrub communities (*Baccharis salicifolia* alliance (i.e., mulefat thickets), *Artemisia californica* – *Lotus scoparius* association (i.e., California sagebrush – deer weed), *Encelia californica* shrubland alliance (i.e., California brittle bush scrub), and *Lotus scoparius* alliance (i.e., deer weed scrub) occur within the Project site. *Encelia californica* shrubland alliance (i.e., California brittle bush scrub) is identified as S3 and considered sensitive in California Natural Community List (CDFW 2021a).

The Project would impact the entire site, thus impacting 0.45 acres of *Encelia californica* association/California brittle bush association. Due to the disconnected nature of the *Encelia californica* association/California brittle bush association to other native habitats and surrounding business park, parking surfaces, and residential, the overall habitat value of the *Encelia californica* association/California brittle bush association is reduced. If Project is unable to avoid removal of the 0.45 acres of *Encelia californica* association/California brittle bush association, the following measures (**MM BIO-1 Habitat Mitigation Monitoring Plan**) are recommended to reduce impacts to **less than significant with mitigation**:

MM-BIO-1 **Habitat Mitigation and Monitoring Plan.** Prior to issuance of a Project grading permit, the Applicant shall contract with a qualified biologist to develop a Habitat Mitigation and Monitoring Reporting Plan (Plan) to mitigate for impacts to California Department of Fish and Wildlife (CDFW) sensitive vegetation communities. The Plan shall outline efforts to restore or enhance California brittle bush, and, therefore, preserve or provide wildlife habitat within similar habitats adjacent to the impacted biological resources. The Plan may focus on the following:

- In-kind restoration of California brittle bush scrub through incorporation of California brittle bush into the landscape plan; or
- Restoration of areas occupied by non-native habitats or native habitats with large components of non-native vegetation, within similar habitats adjacent to the impacted biological resources.

Under the Plan, a total of 0.45 acres of California brittle bush scrub, a CDFW sensitive vegetation community, permanently impacted shall be mitigated on site in-kind at 2:1. As mitigation potential within the Project area may be insufficient for mitigating 0.90 acres permanent impacts to CDFW sensitive vegetation communities at 2:1, any additional mitigation required shall be carried out on areas within adjacent land controlled by the City.

A qualified biologist/botanist shall develop the Plan, which shall provide specific measures to restore or enhance habitat to replace the loss of California brittle bush scrub. This Plan shall be focused on adaptive management principles and shall identify detailed enhancement areas and strategies based on the parameters outlined below, with long-term timing and monitoring requirements. The Plan shall:

1. Provide an up-to-date inventory of on-site native vegetation resources.
2. Define attainable and measurable goals and objectives to achieve through implementation of the Plan. Goals and objections shall focus on replacement of California brittle bush scrub removed during construction.

3. Provide site selection and justification.
4. Detail a restoration work plan including methodologies, restoration schedule, plant materials (seed and container plant) sourcing – locally genetic stock, and implementation strategies.
5. Provide a detailed maintenance plan to include removal of invasive non-native species.
6. Define performance standards.
7. Provide a monitoring plan to include methods and analysis of results. Also, include goal success or failure criteria, and an adaptive management plan and suggestions for failed restoration efforts.
8. Restored areas shall be monitored for five years following planting.
9. Annual reports and the final report shall be submitted to the City and County.

5.2 Plant Species

No special-status plant species are expected to occur within the Project site; therefore, the Project would have **no impacts** to special-status plant species.

5.3 Protected Tree Species

The City protects oak trees and landmark trees through City Ordinance. Municipal Code Section 9-4.43 provides the landmark tree preservation ordinance and Municipal Code Section 9-4.42 provides the oak tree protection ordinance. There are 77 protected trees on the project site: 50 oak trees that are protected under the Oak Tree Ordinance No. 2010-14 and 27 California sycamores that are protected under the Landmark Tree Ordinance No. 2017-NS. As shown in Figure 4, these trees are located throughout the Project site. This analysis is based on the Landmark Tree and Oak Tree Report (Appendix A), as well as a tree survey verification by a Dudek ISA Certified Arborist.

In accordance with the Oak Tree Ordinance, no person shall cut, remove, encroach into the protected zone, or relocate any oak tree on any public or private property within the City, unless a valid oak tree permit has been issued by the City pursuant to the provisions of the Oak Tree Ordinance and the oak tree preservation and protection guidelines.

Direct Tree Impacts/Tree Removal

For the purposes of this report, direct impacts are those associated with tree removal or encroachment within the tree-protected zone (a distance of 15 feet from the trunk or 5 feet from the dripline, whichever is greater). Tree removal is expected to be required when the trunk is located inside or within 2 feet of the proposed limits of grading. Encroachment is expected when soil and roots are disturbed within the tree-protected zone.

As reflected in Appendix A, grading impacts extend throughout the project site, and have direct or indirect impacts to all protected trees. Table 10 summarizes the number of protected trees by species that are expected to be directly or indirectly impacted by construction.

The Landmark Tree and Oak Tree Report (Appendix A) recommends the removal of 64 trees based on the direct impacts from grading and construction. Based on the project plans, all trees would experience impacts to their root zones that would require removal. If Project plans proceed as proposed, the Applicant would be required to obtain a City of Thousand Oaks Oak/Landmark Tree Permit prior to construction and mitigate impacts per **MM-BIO-2 Protected Tree Removal and Replacement**.

Actual tree impact removals numbers may be different than anticipated and presented in this report once grading plans are staked in the field and are being implemented. Any adjustments to the number of possible impacted trees will be documented by the proposed Project's ISA Certified Arborist.

Table 10. Summary of Direct and Indirect Impacts to Protected Trees

| Tree Species | | Direct Impacts | |
|--------------------------|---------------------|----------------|--------------|
| Scientific Name | Common Name | Removal | Encroachment |
| <i>Platanus racemosa</i> | California sycamore | 23 | 4 |
| <i>Quercus agrifolia</i> | coast live oak | 36 | 7 |
| <i>Quercus ilex</i> | holly oak | 2 | 2 |
| <i>Quercus suber</i> | cork oak | 3 | 0 |
| Total | | 64 | 13 |

Tree Relocations

The Landmark Tree and Oak Tree Report (Appendix A) proposes to relocate 10 protected oak trees back on-site that are listed as removals. Trees identified as candidates for relocation typically exhibit good health (new growth and vigor) and structure (trunk/branching); have no uncorrectable, outwardly detectable defects; and show no signs or symptoms of serious pest infestation or species-specific pathogens. In order for the trees to avoid incidental damage during construction or relocation, preservation and protection measures must be provided before, during, and following the construction phase.

Based on tree health, structure, observable defects, and tree location, tree nos. 37, 38, 41, 47, 48, 65, 69, 70, 72, and 74—are considered potential candidates for relocation. City Oak Tree Preservation and Protection Guidelines Resolution No. 2010-014 states that “the size of the relocated trees should not exceed six (6”) inches in diameter.” A total of 9 of the 10 relocation trees exceed a diameter of 6 inches and will require approval from the City. If the relocation of these trees is approved, they will not require additional replacement trees. As such, 54 of the total removals will require replacement trees to be planted back on site.

To avoid and minimize impacts to oak trees and landmark trees the following measures (**MM-BIO-2 Relocation Tree Maintenance and Monitoring**, **MM-BIO-3 Protected Tree Removal and Replacement**, **MM-BIO-4 Tree Protection Measures Prior to Construction**, **MM-BIO-5 Tree Protection and Maintenance During Construction**, and **MM-BIO-5 Tree Maintenance After Construction**) shall be implemented to avoid conflicts with the City's tree protection ordinance and reduce impacts to **less than significant with mitigation**. These measures should be monitored by an ISA Certified Arborist and enforced by contractors and developers for maximum benefit to the trees.

MM-BIO-2 Relocation Tree Maintenance and Monitoring. The relocation trees shall be maintained and monitored for 5 years following tree relocation and installation. Trees shall be installed per International Society of Arboriculture (ISA) tree planting specifications under the direction and supervision of an ISA Certified Arborist. A refundable cash security deposit, in an amount equal to the cost of purchasing an equivalent nursery grown oak tree shall be made with the Community Development Department prior to tree relocation. The deposit shall be refunded after twelve (12) months if, in the opinion of the Community Development Department, the relocated tree has survived and is considered to be in good health. If the tree is considered to be marginal, the deposit

shall be retained for an additional twelve (12) months, when another inspection shall be conducted. If the health of the tree is unchanged or had declined, the developer shall remove the relocated tree and replace it with an equivalent nursery grown oak tree. The security deposit shall then be refunded to the developer. Installed trees shall be monitored by an ISA Certified Arborist for the first 5 years after installation. The ISA Certified Arborist shall submit an annual report documenting tree species, diameter, height above grade, measured dripline, appearance and health conditions, physical description, and photographs of each tree.

MM-BIO-3 Protected Tree Removal and Replacement. All protected oak and sycamore trees shall be replaced on a 3:1 ratio for total of 108 24-inch box size trees, and 54 36-inch box size trees, consisting of similar species to those being removed, and shall be planted and depicted on the landscape architect's planting plan. If different sized trees are proposed for installation or an alternate mitigation site is identified, the proposed size, quantity, and site shall be approved by the City of Thousand Oaks Community Development Director. Additionally, a 5-year tree maintenance fee shall be paid to the Community Development Department for off-site replacement trees. Trees shall be installed per International Society of Arboriculture (ISA) tree planting specifications under the direction and supervision of an ISA Certified Arborist. Installed trees shall be monitored by an ISA Certified Arborist for the first 5 years after installation. The ISA Certified Arborist shall submit an annual report documenting tree species, diameter, height above grade, measured dripline, appearance and health conditions, physical description, and photographs of each tree.

MM-BIO-4 Tree Protection Prior to Construction. An International Society of Arboriculture (ISA) Certified Arborist shall be retained to oversee implementation of the following:

Fencing: All remaining trees that will not be relocated or removed shall be preserved and protected in place. Trees within approximately 15 feet of proposed construction activity shall be temporarily fenced with chain link or other material satisfactory to City planning staff throughout grading and construction activities. The fencing shall be installed 5 feet outside of the dripline of each tree (or edge of canopy for cluster of trees), be 4 feet tall, and staked every 6 feet. The fenced area shall be considered the TPZ unless proximate construction requires temporary removal.

Flagging: Above ground tree parts that could be damaged by construction equipment (e.g., low limbs, trunks) shall be flagged with red ribbon prior to the start of construction.

Pre-Construction Meeting: A pre-construction meeting shall be held between all contractors (including grading, tree removal/pruning, builders) and the ISA Certified Arborist. The ISA Certified Arborist shall instruct the contractors on tree protection practices and answer any questions. All equipment operators and spotters, assistants, or those directing operators from the ground, shall provide written acknowledgement of their receiving tree protection training. This training shall include information on the location and marking of protected trees, the necessity of preventing damage, and the discussion of work practices that will accomplish such.

MM-BIO-5 **Tree Protection and Maintenance During Construction.** An International Society of Arboriculture (ISA) Certified Arborist shall be retained to oversee implementation of the following:

Equipment Operation and Storage: Heavy equipment operation and storage shall be avoided around the trees. Operating heavy machinery around the root zones of trees will increase soil compaction, which decreases soil aeration and subsequently reduces water penetration in the soil. All heavy equipment and vehicles shall, at minimum, stay out of the fenced tree protection zone (TPZ), unless where specifically approved in writing and under the supervision of an ISA Certified Arborist or as provided by the approved landscape plan.

Storage and Disposal: Do not store or discard any supply or material, including paint, lumber, concrete overflow, etc. within the tree protection zone. Remove all foreign debris within the tree protection zone; it is important to leave the duff, mulch, chips, and leaves around the retained trees for water retention and nutrients. Avoid draining or leakage of equipment fluids near retained trees. Fluids such as gasoline, diesel, oils, hydraulics, brake and transmission fluids, paint, paint thinners, and glycol (anti-freeze) shall be disposed of properly. Keep equipment parked at least 50 feet away from retained trees to avoid the possibility of leakage of equipment fluids into the soil. The effect of toxic equipment fluids on the retained trees could lead to decline and death.

Grade Changes: Grade changes, including adding fill, are not permitted within the TPZ without special written authorization and under the supervision of an ISA Certified Arborist or as provided by the approved landscape plan. Lowering the grade within this area will necessitate cutting main support and feeder roots, jeopardizing the health and structural integrity of the tree(s). Adding soil, even temporarily, on top of the existing grade will compact the soil further, and decrease both water and air availability to the trees' roots.

Moving Construction Materials: Care shall be taken when moving equipment or supplies near the trees, especially overhead. Avoid damaging the tree(s) when transporting or moving construction materials and equipment and working near the trees (even outside of the fenced tree protection zone). Above ground tree parts that could be damaged (e.g., low limbs, trunks) shall be flagged with red ribbon prior to the start of construction, per MM-BIO-3. If contact with the tree crown is unavoidable, the conflicting branch(es) shall be pruned using ISA standards under the direction and supervision of an ISA Certified Arborist.

Root Pruning: Except where specifically approved in writing, all trenching shall be outside of the fenced tree protection zone. Roots primarily extend in a horizontal direction forming a support base to the tree similar to the base of a wineglass. Where trenching is necessary in areas that contain tree roots, roots shall be pruned the roots using a Dosko root pruner or equivalent and under the direction and supervision of an ISA Certified Arborist. All cuts shall be clean and sharp, to minimize ripping, tearing, and fracturing of the root system. The trench shall be made no deeper than necessary.

Irrigation: In the event that root pruning is necessary, trees that have been substantially root pruned (30% or more of their root zone) will require irrigation for the first 12 months. The first irrigation shall be within 48 hours of root pruning. They shall be deep watered every 2 to 4 weeks during the summer and once a month during the winter (adjust accordingly with rainfall). One irrigation cycle shall thoroughly soak the root zones of the trees to a depth of 3 feet. The soil shall dry out between

watering; avoid keeping a consistently wet soil. Designate one person to be responsible for irrigating (deep watering) the trees. Check soil moisture with a soil probe before irrigating. Irrigation is best accomplished by installing a temporary above ground micro-spray system that will distribute water slowly (to avoid runoff) and evenly throughout the fenced protection zone *but never soaking the area located within 6 feet of the tree trunk, especially during warmer months.*

Pruning: Trees shall not be pruned until all construction is completed. This will help protect the tree canopies from damage. All pruning shall be completed under the direction of an ISA Certified Arborist and using ISA guidelines. Only dead wood shall be removed from tree canopies.

Washing: During construction in summer and autumn months, wash foliage of trees adjacent to the construction sites with a strong water stream every two weeks in early hours before 10:00 a.m. to control mite and insect populations.

Inspection: An ISA Certified Arborist shall inspect the 26 preserved trees on a monthly basis during construction. A report comparing tree health and condition to the original, pre-construction baseline shall be submitted following each inspection. Photographs of representative trees are to be included in the report on a minimum annual basis.

MM-BIO-6 **Tree Maintenance After Construction.** Once construction is complete the fencing may be removed and the following measures shall be performed to sustain and enhance the vigor of the preserved trees:

Mulch: Provide a 4-inch mulch layer under the canopy of trees. Mulch shall include clean, organic mulch that will provide long-term soil conditioning, soil moisture retention, and soil temperature control.

Pruning: The trees will not require regular pruning. Pruning shall only be done to maintain clearance and remove broken, dead or diseased branches. Pruning shall only take place following a recommendation by an International Society of Arboriculture (ISA) Certified Arborist and performed under the supervision of an ISA Certified Arborist. No more than 20% of the canopy shall be removed at any one time. All pruning shall conform to ISA standards.

Watering: The natural trees that are not disturbed shall not require regular irrigation, other than the 12 months following substantial root pruning. However, soil probing shall be necessary to accurately monitor moisture levels. Especially in years with low winter rainfall, supplemental irrigation for the trees that sustained root pruning and any newly planted trees may be necessary. The trees shall be irrigated only during the winter and spring months.

Watering Adjacent Plant Material: All plants near the trees shall be compatible with water requirements of said trees. The surrounding plants shall be watered infrequently with deep soaks and allowed to dry out in-between, rather than frequent light irrigation. The soil shall not be allowed to become saturated or stay continually wet. Irrigation spray shall not hit the trunk of any tree. A 60-inch dry-zone shall be maintained around all tree trunks. An aboveground micro-spray irrigation system is recommended over typical underground pop-up sprays.

Washing: Periodic washing of the foliage is recommended during construction but no more than once every 2 weeks. Washing shall include the upper and lower leaf surfaces and the tree bark. This shall continue beyond the construction period at a less frequent rate with a high-powered hose only in the early morning hours. Washing will help control dirt/dust buildup that can lead to mite and insect infestations.

Spraying: If the trees are maintained in a healthy state, regular spraying for insect or disease control shall not be necessary. If a problem does develop, an ISA Certified Arborist shall be consulted; the trees may require application of insecticides to prevent the intrusion of bark-boring beetles and other invading pests. All chemical spraying shall be performed by a licensed applicator under the direction of a licensed pest control advisor.

Inspection: All trees that were impacted during construction within the TPZ shall be monitored by an ISA Certified Arborist for the first 5 years after construction completion. The ISA Certified Arborist shall submit an annual report, photograph each tree and compare tree health and condition to the original, pre-construction baseline.

5.4 Wildlife Species

No special-status wildlife species are expected to occur within the Project site; therefore, the Project would have no impacts on special-status wildlife species. Removal of trees and vegetation associated with construction of Project have the potential to disturb nesting birds on and adjacent to the site, to the degree that the nests may be abandoned, resulting in a direct loss of an active bird nest. Bird nests with eggs or young of all migratory bird species are protected under the MBTA and the California Fish and Game Code. Loss of active nests as a result of construction or other site-preparation activities may potentially be in conflict with these regulations. Nesting birds within the Project site would primarily be American crow, Anna's hummingbird, bushtit (*Psaltiriparus minimus*), California towhee, dark-eyed junco (*Junco hyemalis*), house finch, Eurasian collared-dove (*Streptopelia decaocto*), and northern mockingbird (*Mimus polyglottos*).

Active bird nests or nests with eggs or young of all native bird species are protected under the MBTA and the California Fish and Game Code. If Project tree and/or vegetation removal is unable to avoid the February 1 through August 30 nesting bird period, the following measures (**MM BIO-7 Pre-Construction Nesting Bird Survey** and **MM BIO-8 Nesting Bird Buffers and Requirements**) are recommended to reduce impacts to **less than significant with mitigation**:

MM-BIO-7 Pre-Construction Nesting Bird Survey. A pre-construction survey for nesting birds shall be conducted by a City of Thousand Oaks-approved biologist to determine if active (nests containing eggs, nestlings, or associated with dependent fledglings) of special-status birds, or common bird species protected by the Migratory Bird Treaty Act and/or the California Fish and Game Code, are present in the construction zone or within 300 feet of the construction zone. The survey shall be conducted within 1 week prior to construction or site preparation activities that would occur during the nesting/breeding season of native bird species potentially nesting on the site (typically February 1 through August 31). The pre-construction nesting bird survey shall be repeated if there is a delay in the start of construction activity or there is a lapse in construction activity of 2 weeks or greater has occurred.

Within 1 week before the start of construction activities, a City of Thousand Oaks-approved biologist shall conduct the nesting bird survey. A preconstruction nesting bird report shall be completed and submitted to the City of Thousand Oaks within 48 hours of the survey.

MM-BIO-8 Nesting Bird Buffers and Requirements. If active nests are found, a no-construction buffer shall be established at a minimum of 50 feet for non-raptor bird species and 200 feet for raptor species (this distance may be greater depending on the bird species and construction activity, as determined by the City of Thousand Oaks-approved biologist) around the nest site where it overlaps with work areas. Tree and vegetation clearing and construction within the no-construction buffer shall be postponed or halted, at the discretion of the City of Thousand Oaks-approved biologist, until the nest is vacated, juveniles have fledged, and there is no evidence of a second attempt at nesting. In addition, all active nests shall be mapped with a GPS unit and nest locations with 100-foot buffers overlain on aerial photographs to provide regular updated maps to inform the Project manager/engineer and construction crew of areas to avoid. The City of Thousand Oaks-approved biologist shall also serve as a construction monitor during the breeding season to ensure that there are no inadvertent impacts to nesting birds.

Bird nest surveys shall be conducted every 14 days following identification of an active bird nest until all birds have fled the nest and the nest is deemed inactive by the City of Thousand Oaks-approved biologist. A bird nest monitoring report shall be completed and submitted to the City of Thousand Oaks within 48 hours of each survey.

5.5 Critical Habitat

No critical habitat is present within the Project site; therefore, the Project would have **no impacts** to critical habitat.

5.6 Wildlife Corridors and Habitat Linkages

No wildlife corridors are present within the Project site. Although the Project site is limited in size and is surrounded by development, the Project site is along migratory bird routes which are utilized day and night. Exterior lighting may disorient and impact migratory birds. To reduce impact to migratory birds the following measures (**MM BIO-9 Exterior Lighting**) are recommended to reduce impacts to **less than significant with mitigation**:

MM-BIO-9 Exterior Lighting. Exterior lighting shall be designed to minimize upward directed lighting and minimize the duration and amount of lighting through implementation of the following:

- Incorporate fixture hoods/shielding to orient exterior lighting downward to eliminate horizontal glare and upward directed light
- Install automatic motion sensors and controls on exterior lighting to minimize the lighting durations
- Turn off interior lighting when not in use, perhaps with motion sensors and controls
- Assess site quality and quantity of light needed, avoiding over-lighting with newer, brighter technology.

5.7 Aquatic Resources

As discussed in Section 4.7, no jurisdictional aquatic resources occur on site.

There is potential for indirect impacts to downstream aquatic resources (i.e., Arroyo Conejo) through the storm drain network during Project demolition and construction. Potential indirect impacts may include runoff, sedimentation, chemical pollution, erosion, or litter. The City of Thousand Oaks requires a Stormwater Pollution Control Plan for all projects for which the disturbed area is greater than 1 acre. The Stormwater Pollution Control Plan shall be on file with the City of Thousand Oaks prior to issuance of a grading permit and a copy shall be maintained at the job site at all times. Additionally, construction activities including clearing, grading, disturbances to soil such as stockpiling, or excavation that results in disturbances of at least 1 acre of total land are required by the state of California to apply for a National Pollutant Discharge Elimination System General Permit for stormwater discharges associated with construction activity. A Notice of Intent shall be filed with the appropriate fees to the State Water Resources Control Board.

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Appendix A

Landmark Tree and Oak Tree Report

LANDMARK TREE AND OAK TREE REPORT

SUBJECT

**1100 Rancho Conejo Boulevard – Office and Lab Campus
Newbury Park**

PREPARED FOR:

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Los Angeles, CA 90071**

PREPARED BY:

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**Date: May 6, 2022
Revised Date: May 27, 2022
LNDG Project No.: 200-844**

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1. ASSIGNMENT

The objective of this report is to assess the condition of the site's protected trees, to discuss the proposed encroachments of the trees, and to discuss the effect of the encroachments on the health of the trees.

2. BACKGROUND

The subject site has 3 buildings and parking lots. All of the trees but one were planted in the landscape. The only tree that pre-existed the development of the site is tree #36

3. METHOD OF STUDY

The protected trees were assessed using our standard visual inspection completed in August/September of 2021. The trees were tagged with numbered, metal tags. These tags are affixed to the sides of the trees and correspond to the numbers on the tree location map. The trees were inspected using the ISA Level 2 or Basic Assessment which is a ground-level, visual inspection assessing their general health using measuring tools and tools to observe the exterior of the tree.

4. DISCUSSION

The protected trees on this site consist of 27 California sycamores, 43 coast live oaks, 4 holly oaks, and 3 cork oaks. The project work will be the demolition of the existing buildings and all hardscape and the construction of 4 new buildings and an expanded parking lot. Within the protected zones of the trees to be preserved, the demolition must be performed to minimize the damage to the root system. Trees are proposed to be removed when they fall within the footprint of the 4 buildings or in the parking lot. Where possible, landscape planters were created to accommodate existing trees. In the garden courtyard, large sycamore trees were able to be preserved. Pathways and gathering areas will be created without severely encroaching the sycamores because the existing grade and the finish grade are close. Ten oak trees will be transplanted in an effort to preserve additional trees that cannot be saved in place.

The following trees are proposed to be removed:

Tree #1 (sycamore) – will be in the footprint of the new Building Alexandria. Remove.

Tree #2 (sycamore) – will be in the footprint of Building A. Remove.

Tree #3 (sycamore) – will be in paved walkway near drop off area at the parking lot. The finish grade is 1 foot below the existing grade. Remove.

Tree #4 (sycamore) – will be in driveway near drop off zone. Remove.

Tree #5 (sycamore) – will be close to parking lot – 3 feet from the curb – that will be 2 feet below finish grade. Remove.

Tree #6 (sycamore) – will be close to parking lot – 4 feet from the curb – that will be 2 feet below finish grade. Remove.

Tree #9 (cork oak) – will be in walkway from the building to the parking lot. The trunk will be 10 feet from the corner of the parking lot curb – 2 feet below existing grade – and 20 feet from the new building. Remove.

Tree #10 (holly oak) – will be in the footprint of Building A. Remove.

Tree #11 (holly oak) – will be 13 feet from Building A and on the curb for the parking lot. Remove.

Tree #12 (cork oak) – will be in the footprint of Building A. Remove.

Tree #13 (cork oak) – will be in the entry driveway. Remove.

Tree #14 (sycamore) – will be in the entry driveway. Remove.

Tree #18 (sycamore) – will be in the footprint of Building A. Remove.

Tree #19 (sycamore) – At the center of the site will be a courtyard garden with paved pathways and level areas where people will gather. This tree will be located where a path and set of stairs is proposed and the finish grade will be 3 feet below the existing grade. Remove.

Tree #24 (sycamore) – will be 18 feet from Building C and the finish grade will be 3 feet below existing grade. Tree is in poor health. Remove.

Tree #25 (sycamore) – will be 18 feet from Building C and the finish grade will be 3 feet below existing grade. Remove.

Tree #26 (sycamore) – will be 30 feet from Building C and the finish grade will be 1 foot above existing grade. Tree is in poor health. Remove.

Tree #27 (sycamore) – will be in the footprint of Building C. Remove.

Tree #28 (sycamore) – will be in the footprint of Building C. Remove.

Tree #29 (sycamore) – will be in the footprint of Building C. Remove.

Tree #30 (sycamore) – will be in the footprint of Building C. Remove.

Tree #31 (sycamore) – will be in the footprint of Building C. Remove.

Tree #32 (sycamore) – will be in the footprint of Building C. Remove.

Tree #33 (sycamore) – will be in the footprint of Building C. Remove.

Tree #34 (sycamore) – will be in the footprint of Building C. Remove.

Tree #35 (sycamore) – will be 30 feet from Building C and the finish grade will be 3 feet below the existing grade. Remove.

Tree #36 (coast live oak) – This tree is located on an existing slope that will be graded to manufacture a slope to construct the large parking lot at the east side of the site. The existing grade of where this tree sits is approximately 682 feet and the finish grade will be 690 feet. Remove.

Tree #37 (coast live oak) – will be in the parking area along the east property line. The finish grade will be 4 feet above the existing grade. Remove.

Tree #38 (coast live oak) – will be in the parking area along the east property line. The finish grade will be 5 feet above the existing grade. Remove.

Tree #39 (coast live oak) – will be in the parking area along the east property line at the proposed retaining wall that is a screen for the residential area. Remove.

Tree #40 (coast live oak) – will be in the parking area along the east property line at the proposed retaining wall that is a screen for the residential area. Remove.

Tree #41 (coast live oak) – will be in the parking area. The finish grade will be 3.5 feet above the existing grade. Remove.

Tree #43 (coast live oak) – will be in a driveway in the parking area. The finish grade will be 1.5 feet above the existing grade. Remove.

Tree #44 (coast live oak) – will be in a driveway in the parking area. Remove.

Tree #45 (coast live oak) – will be in a driveway in the parking area. The finish grade will be 7 feet above the existing grade. Remove.

Tree #46 (coast live oak) – will be in a driveway in the parking area. The finish grade will be 9 feet above the existing grade. Remove.

Tree #47 (coast live oak) – will be in the parking area. The finish grade will be 10 feet above the existing grade. Remove.

Tree #48 (coast live oak) – will be in the parking area. The finish grade will be 10 feet above the existing grade. Remove.

Tree #49 (coast live oak) – will be in a driveway in the parking area. The finish grade will be 11 feet above the existing grade. Remove.

Tree #51 (coast live oak) – will be in a driveway in the parking area. The finish grade will be 4 feet below the existing grade. Remove.

Tree #52 (coast live oak) – will be in the parking area. The finish grade will be 2.5 feet below the existing grade. Remove.

Tree #53 (coast live oak) – will be in a driveway in the parking area. The finish grade will be 4 feet below the existing grade. Remove.

Tree #54 (coast live oak) – will be in the footprint of Building B. Remove.

Tree #55 (coast live oak) – will be in the footprint of Building B. Remove.

Tree #56 (sycamore) – will be in the footprint of Building B. Remove.

Tree #57 (coast live oak) – will be in the footprint of Building B. Remove.

Tree #58 (coast live oak) – will be in the footprint of Building B. Remove.

Tree #59 (coast live oak) – will be in the footprint of Building B. Remove.

Tree #60 (coast live oak) – will be in the driveway to a loading zone. The finish grade will be 1 foot above the existing grade. Remove.

Tree #63 (coast live oak) – will be in a driveway in the parking area. Remove.

Tree #64 (coast live oak) – will be in the parking area. The finish grade will be 5 feet above the existing grade. Remove.

Tree #65 (coast live oak) – will be in the parking area. The finish grade will be 1 foot above the existing grade. Remove.

Tree #66 (coast live oak) – will be in the parking area. The finish grade will be 6 feet above the existing grade. Remove.

Tree #67 (coast live oak) – will be in the parking area. The finish grade will be 1.5 feet above the existing grade. Remove.

Tree #68 (coast live oak) – will be in the parking area. The finish grade will be 2 feet above the existing grade. Remove.

Tree #69 (coast live oak) – will be in the parking area. The finish grade will be 2 feet above the existing grade. Remove.

Tree #70 (coast live oak) – will be in a driveway entrance for the the parking area in the northeast corner. The finish grade will be 5 feet above the existing grade. Remove.

Tree #71 (coast live oak) – will be in a driveway entrance for the parking area. The finish grade will be 3 feet above the existing grade. Remove.

Tree #72 (coast live oak) – will be in a driveway entrance for the parking area. The finish grade will be 3 feet above the existing grade. Remove.

Tree #73 (coast live oak) – will be in a landscape area between the driveway entrance and the parking area. The finish grade will be 1 foot above the existing grade. Remove.

Tree #74 (coast live oak) – will be in the parking area. The finish grade will be 2 feet above the existing grade. Remove.

Tree #75 (coast live oak) – will be in the parking area. The finish grade will be 3 feet above the existing grade. Remove.

Tree #76 (coast live oak) – will be in the parking area. The finish grade will be 3 feet above the existing grade. Remove.

Tree #77 (sycamore) – will be in a driveway to the parking area. The finish grade will be 1 foot above the existing grade. Remove.

The following trees are proposed to be encroached:

Tree #7 – The curb for the parking area will be 13 feet from the trunk. The grading and pavement will be close to the existing grade. No grading should take place within 10 feet of the trunk. The shallow excavation will encroach 24 percent of the protected zone (PZ). No pruning.

Tree #8 - The curb for the parking area will be 10 feet from the trunk. The grading and pavement will be close to the existing grade. No grading should take place within 10 feet of the trunk. The shallow excavation will encroach 40 percent of the protected zone (PZ). No pruning.

Tree #15 – The curb for the parking area will be 5 feet from the trunk of this small tree. The pavement will be at grade. The shallow excavation will encroach 31 percent of the PZ. No pruning.

Tree #16 – The curb for the parking area will be 8 feet from the trunk of this small tree. The pavement will be at grade. The shallow excavation will encroach 20 percent of the PZ. No pruning.

Tree #17 – The curb for the parking area will be 12 feet from the trunk of this small tree. The pavement will be at grade. The shallow excavation will encroach 11 percent of the PZ. No pruning.

Tree #20 – will be preserved in the courtyard garden. No grading will be required but demolition will take place to remove the existing building on the north side and concrete pavement on the south side. This will be a minor encroachment if managed properly. The grade will not change. No pruning.

Tree #21 – will be preserved in the courtyard garden. Some grading is shown to create a pad outside of the PZ that will impact less than 10 percent of the PZ. Demolition will take place as described for tree #20 as they are both close to the building. No pruning.

Tree #22 – will be preserved in the courtyard garden. No grading will be required but demolition will take place to remove concrete pavement south of the tree. This will be a minor encroachment if managed properly. The grade will not change. No pruning.

Tree #23 – will be preserved in the courtyard garden. No grading will be required but demolition will take place to remove concrete pavement south of the tree. This will be a minor encroachment if managed properly. The grade will not change. No pruning.

Tree #42 – A large landscape planter was designed to preserve this tree. Grading contours are shown but actual grading should be minimized and will encroach approximately 20 percent of the PZ. The parking area curb will be 15 feet from the trunk on the north side. Significant pruning will be required to raise and remove the low branches to provide clearance for the driveway. 8 to 10 low branches ranging from 3 to 6 inches must be pruned.

Tree #50 – A driveway on the north side and parking spaces on the east and west sides will encroach no closer than 5 feet from the trunk impacting 55 percent of the PZ. 12 low branches ranging from 2 to 6 inches must be pruned.

Tree #61 – will be encroached by parking spaces on the east side impacting 14 percent of the PZ. Grading should not be done within the landscape planter. No pruning.

Tree #62 – will be encroached by parking spaces on the east side impacting 5 percent of the PZ. Grading should not be done within the landscape planter. No pruning.

The physiological condition of each tree is detailed in the summary of field observations in this report below. The driplines on the tree location map are for graphic purposes. See the Driplines pages in this report for measured dripline dimensions.

Nursery Grown Trees – The northeast end of the property was previously used as a nursery to maintain boxed trees. There are 4 coast live oak trees in large boxes in this area. 2 are near tree #37 and 2 are near tree #39. These oak trees are exempt from protected status because they are boxed trees grown in a nursery.

Oak Trees Proposed to Be Transplanted – 10 trees are proposed as good candidates for transplanting, sycamores were eliminated due to their large size on this site. The 10 oak trees were chosen based on their health, structure, and smaller size. Location was considered: trees near obstructions were eliminated as were trees that would be damaged by digging to box another, better candidate. The following are proposed to be transplanted to another part of the property as part of the landscape installation:

| Tree # | Species | DBH | Crown Spread |
|--------|--------------------------|------------|--------------|
| 37 | <i>Quercus agrifolia</i> | 4" | 12' |
| 38 | <i>Quercus agrifolia</i> | 7", 5" | 16' |
| 41 | <i>Quercus agrifolia</i> | 11" | 28' |
| 47 | <i>Quercus agrifolia</i> | 9" | 25' |
| 48 | <i>Quercus agrifolia</i> | 8" | 18' |
| 65 | <i>Quercus agrifolia</i> | 9" | 20' |
| 69 | <i>Quercus agrifolia</i> | 10" | 28' |
| 70 | <i>Quercus agrifolia</i> | 9" | 28' |
| 72 | <i>Quercus agrifolia</i> | 6", 5", 5" | 15' |
| 74 | <i>Quercus agrifolia</i> | 11" | 29' |

5. RECOMMENDATIONS

The following are general guidelines to preserve the protected trees on the site:

General Tree Protection

- A. The general contractor shall be aware of the requirement to protect all the trees to be preserved for this project and make sure that all others working on the site are aware.
- B. Prior to the commencement of work, fencing shall be placed at the limit of the protected zone, where possible, or at the limit of work, i.e., grading and construction, that was approved by the City of Thousand Oaks Planning Division.
- C. The natural or existing grade of the area within the protected zone (PZ) shall not be raised or lowered unless permitted within the permitted limit of work.
- D. Transporting, handling, and storing building materials near and under trees will compact the soil. Soil compaction injures and kills tree roots, the effects of which may not be seen for months or years. In addition, construction activity can break limbs and wound bark and engine exhaust can damage foliage. The use of equipment shall be limited when in the PZs and nothing should be stored in the PZs including fuels, chemicals, soil, and construction materials.
- E. Construction waste shall be disposed of properly to avoid polluting the soil which can kill roots or inhibit their development.

Pruning

- A. Any pruning approved by the City of Thousand Oaks Planning Division shall be performed only after notification of an arborist 48 hours prior to commencement. The arborist will make sure that the pruning is carried out in accordance with the conditions of the tree permit.
- B. If pruning is required but not previously approved by Planning, it shall not be performed until Planning has been notified and approved it. The arborist should be present to make sure the pruning is carried out properly.
- C. All pruning shall be observed by an arborist and performed to the standards set forth by the International Society of Arboriculture (ISA).

Grading within the Protected Zones of Trees

- A. Grading and excavation that is permitted within the PZ by Planning shall be monitored by an arborist. Care shall be taken to prevent any disturbance of the root zone beyond the approved limit of grading.
- B. The construction of the retaining walls must avoid encroaching into the protected zone of the trees by construction activity beyond the limit of grading. Within the protected zones of trees to be preserved in place, hand trenching shall be done at the limit of the proposed grading to uncover roots, allowing them to be properly and cleanly pruned prior to grade work. This work shall be done under the observation of LNDG.
- B. To preserve vital roots, it may be necessary to perform some grading and excavation by hand. This is usually only required near the trunk of the tree where the roots are larger. The purpose of hand digging is to avoid pulling on roots and causing damage beyond the limit of work. Hand digging will expose important roots prior to excavation that can be pruned carefully. Having pruned the larger roots at the limit of work, usually no more than a few feet deep, the excavation and grading can proceed without fear of pulling up roots attached to the tree.
- C. Roots, especially larger roots, that do not need to be cut because of grading, shall be preserved and protected in place until they can be buried. The roots shall be protected from being wounded and from drying out by protecting them with plywood or a tarp and by keeping the roots moist by applying water once or more each day depending on the time of year and intensity of the sun.

Execution Phase

A. Protective Fencing:

- i. The trees that are to be preserved on the site shall be kept fenced during the life of the project with a 5-foot high, temporary, chain-link fence for protection from damage by construction activities. The chain-link fence must be in place prior to the commencement of demolition and grading. A three-foot-wide opening shall be left in order to access the tree if the tree is surrounded by fencing. The fence shall remain during all phases of construction. Fallen and damaged fencing shall be immediately replaced or repaired.
- ii. In some cases, fencing may be placed at the limit of grading or excavation in order to allow approved work to be done inside the protected zones. No fencing shall be removed or moved without notifying the arborist who will keep the Planning informed.
- iii. Signs shall be placed on the fences that state that the trees are protected by the City of Thousand Oaks. Refer to the City's protection guidelines for the recommended wording to use.

B. Grading and Excavation:

The greatest potential for damage to trees is from excavation for footings, utilities, driveway base elevations, etc. and from grading. It is not possible to develop this site without some conflict between the trees and the proposed improvements including possibly damaging aerial crown (canopy) and the roots. Minimizing damage to the trees can be accomplished as follows:

- i. Define the area of the proposed excavation within the PZ of the tree. Carefully uncover roots that are within 3 feet of the surface and prune them as they are uncovered. Most of the tree roots will be found in the first 3 feet of soil.
- ii. After pruning roots as described above, heavy equipment may be used to remove the soil outside of the preserved roots that were pruned. If more roots are encountered, they must be pruned before continuing to avoid causing additional damage.
- iii. This methodology will minimize root damage caused by excavation equipment pulling on roots in a lateral direction from their path of travel. Roots shall be hand pruned using clean equipment by making a clean, perpendicular. No sealant is recommended.
- iv. Place all excavation spoils from the excavation outside of the PZ of the tree.

C. Other protective measures:

- i. Protect trees by not wounding them. For example, nailing of anything, such as grade stakes, must be avoided.
- ii. The potential for breaking branches by mechanical equipment should be anticipated. Notify the arborist with a request for an evaluation and recommendation if there is the potential for conflict.
- iii. It is important to leave the natural leaf litter that exists beneath trees.


- iv. No chemicals such as herbicides shall be used upstream and within one hundred feet of any tree protected zone.
- v. If grading occurs other than during the rainy season, dust deposited on the foliage of trees must be washed off with water to allow the leaves to function.

NOTICE of DISCLAIMER

The report represents the independent opinion of the signatory consultant (L. Newman Design Group, Inc.). The tree(s) discussed herein was/were generally reviewed for physical, biological function and aesthetic conditions. This examination was conducted in accordance with presently accepted industry procedures, which are a ground-plane macro-visual observation only. No extensive micro-biological, soil-root excavations, upper crown examination nor internal tree investigations were conducted and therefore, the reporting herein reflects the overall visual appearance of the tree(s) on the date reviewed and no warranty is implied as to the potential failure, health or demise of any part of or whole of any tree described in the report. Records may not remain accurate after our inspection due to unknown causes of changeable deterioration of the reviewed site.

Respectfully Submitted,

L. Newman Design Group, Inc.
ASLA California State License #2464



John Oblinger
ISA Certified Arborist WE-6820A
ISA Tree Risk Assessor Qualified

**1100 Rancho Conejo
Thousand Oaks**



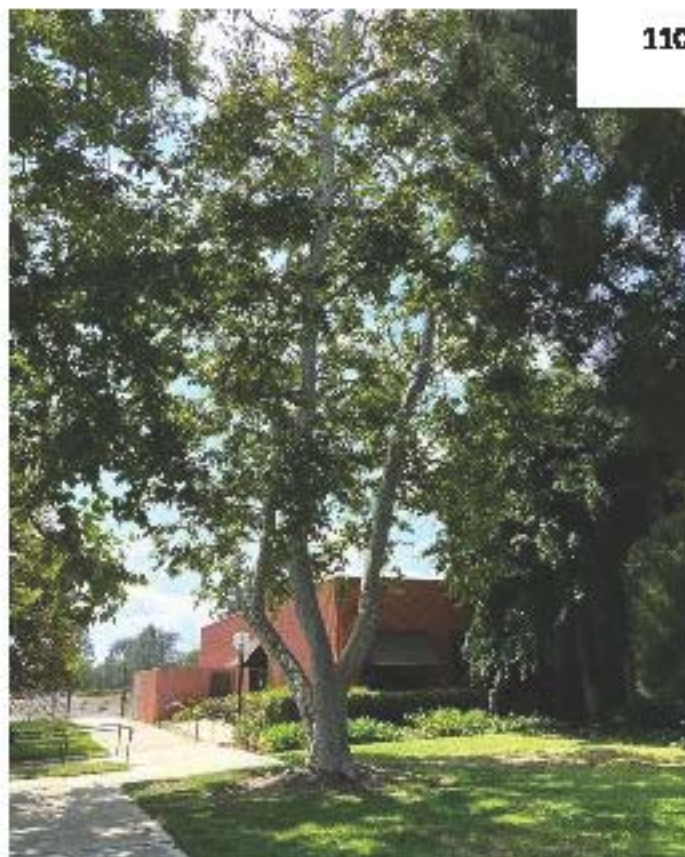
Sycamore tree #1 facing south



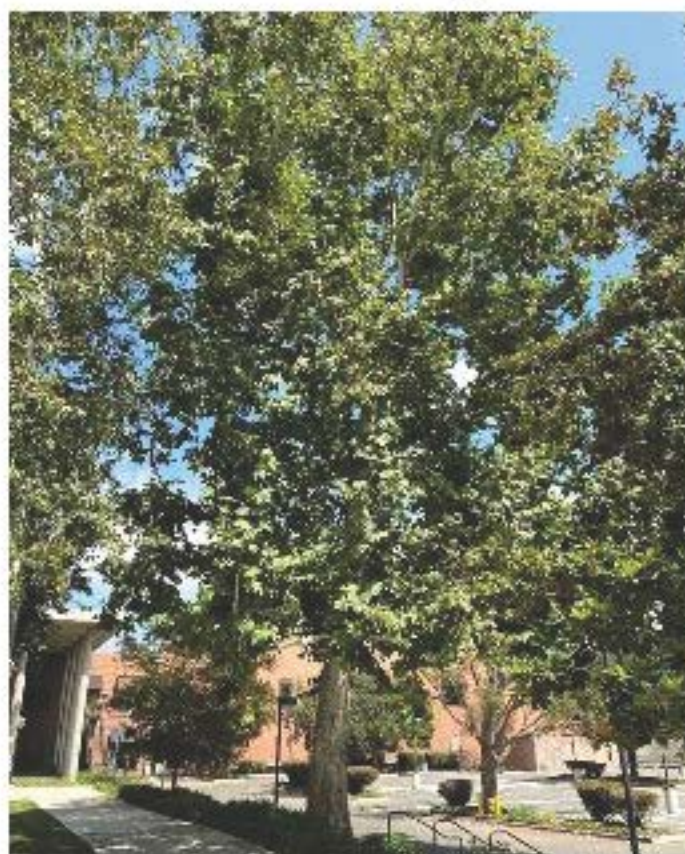
Sycamore tree #2 facing northwest

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**

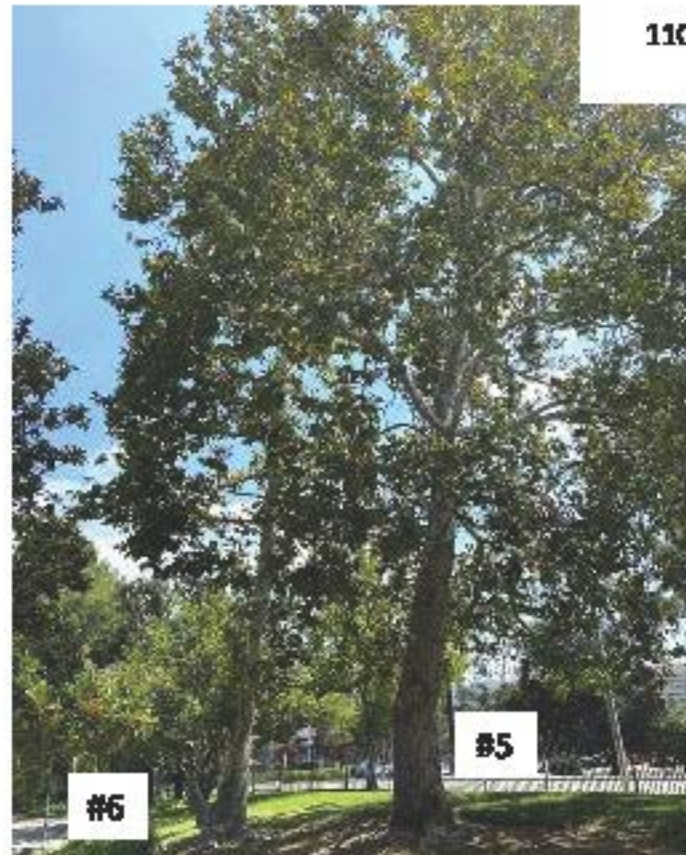


Sycamore tree #3 facing west



Sycamore tree #4 facing north

September 3, 2021



1100 Rancho Conejo
Thousand Oaks

Sycamore trees #6 and #7 facing south



September 3, 2021

Oak trees #7 and #8 facing west

**1100 Rancho Conejo
Thousand Oaks**



Oak tree #9 facing northwest



Oak tree #10 facing north

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



Oak tree #11 facing southeast



Oak tree #12 facing southeast

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



Oak tree #13 facing south



Sycamore tree #14 facing west

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



Oak tree #15 facing south



Oak tree #16 facing southeast

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



Oak tree #17 facing south



Sycamore tree #18 facing southeast

September 3, 2021

1100 Rancho Conejo
Thousand Oaks



Sycamore tree #19 facing east



Sycamore tree #20 facing east

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



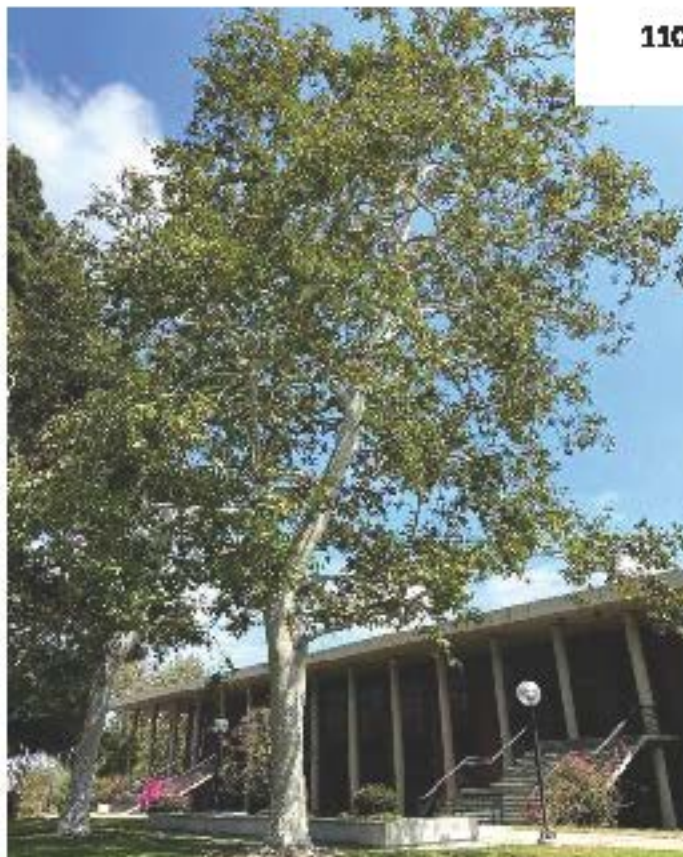
Sycamore tree #21 facing east



September 3, 2021

Sycamore tree #22 facing north

**1100 Rancho Conejo
Thousand Oaks**



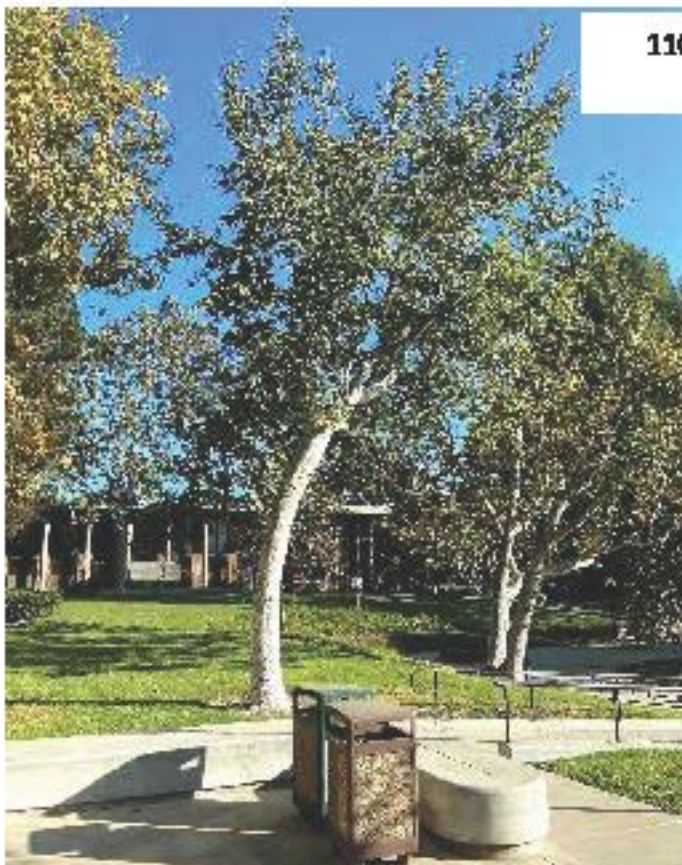
Sycamore tree #23 facing north



Sycamore tree #24 facing southeast

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



Sycamore tree #25 facing southeast



Sycamore tree #26 facing southeast

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



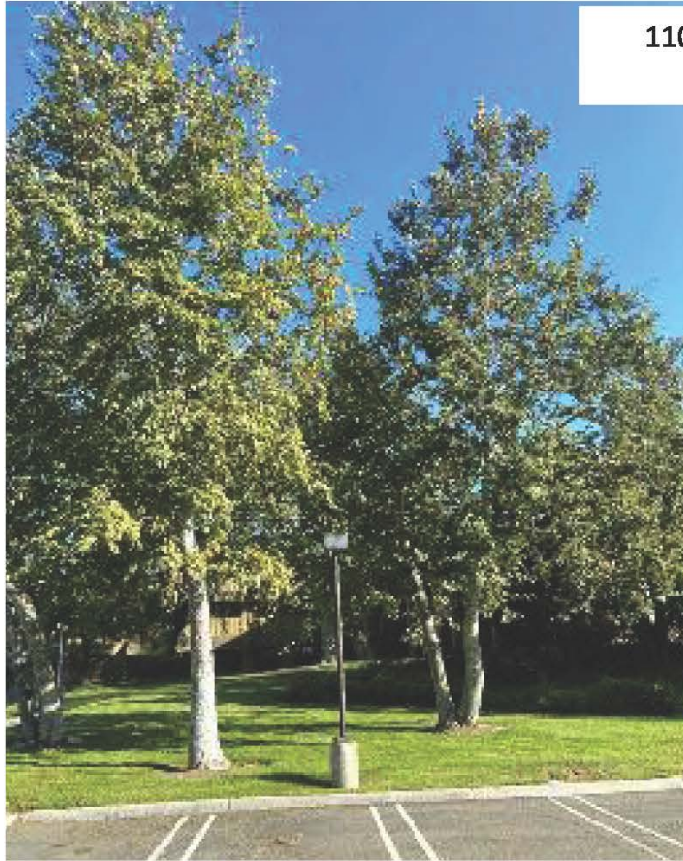
Sycamore tree #27 facing west



Sycamore tree #28 facing west

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



Sycamore trees #30 and #29 facing southeast



Sycamore trees #31 and #32 facing southeast

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



Sycamore trees #33 and #32 facing southeast



Sycamore trees #35 and #34 facing south

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



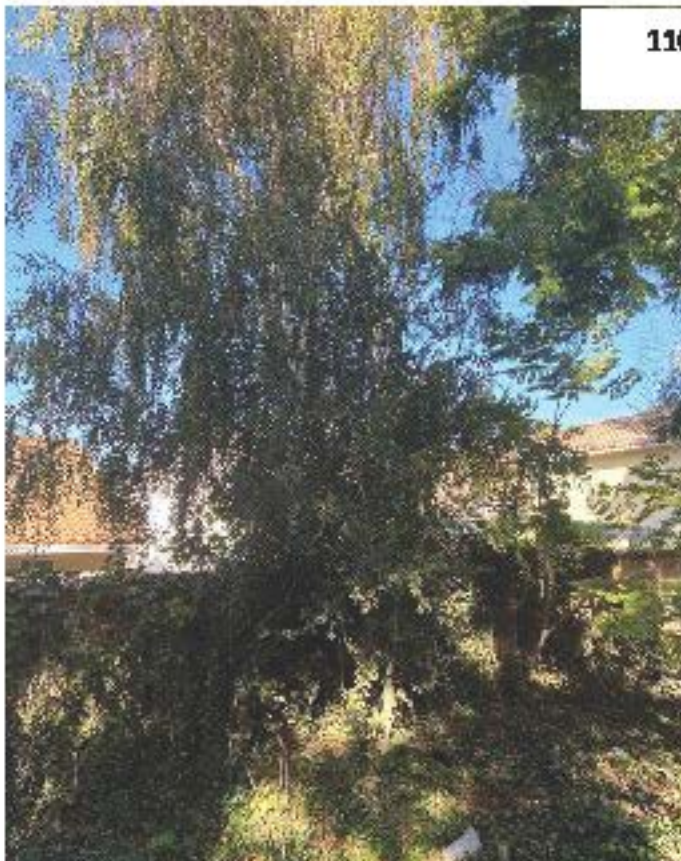
Oak tree #36 facing southeast



Oak tree #37 facing northeast

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



Oak tree #38 facing northeast



Oak tree #39 facing north

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



Oak tree #40 facing east



Oak tree #41 facing west

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



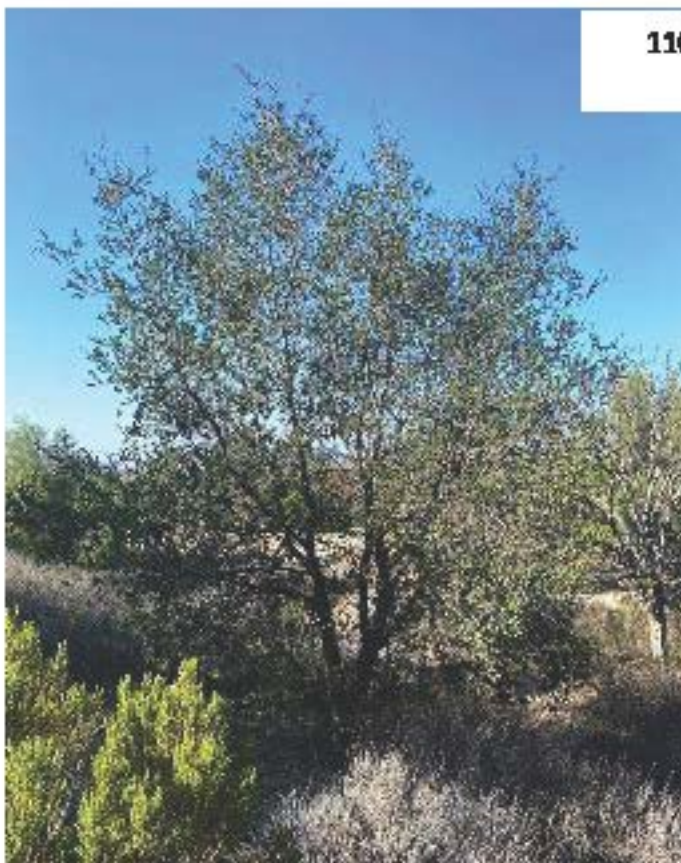
Oak tree #42 facing south



Oak tree #43 facing south

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



Oak tree #44 facing south



Oak tree #45 facing south

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



Oak tree #46 facing southwest



Oak trees #47, #48 and #49 facing south

September 3, 2021

1100 Rancho Conejo
Thousand Oaks



Oak trees #51 and #50 facing northeast



Oak trees #52 and #43 facing east

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



Oak tree #53 facing northeast



Oak tree #54 facing northeast

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



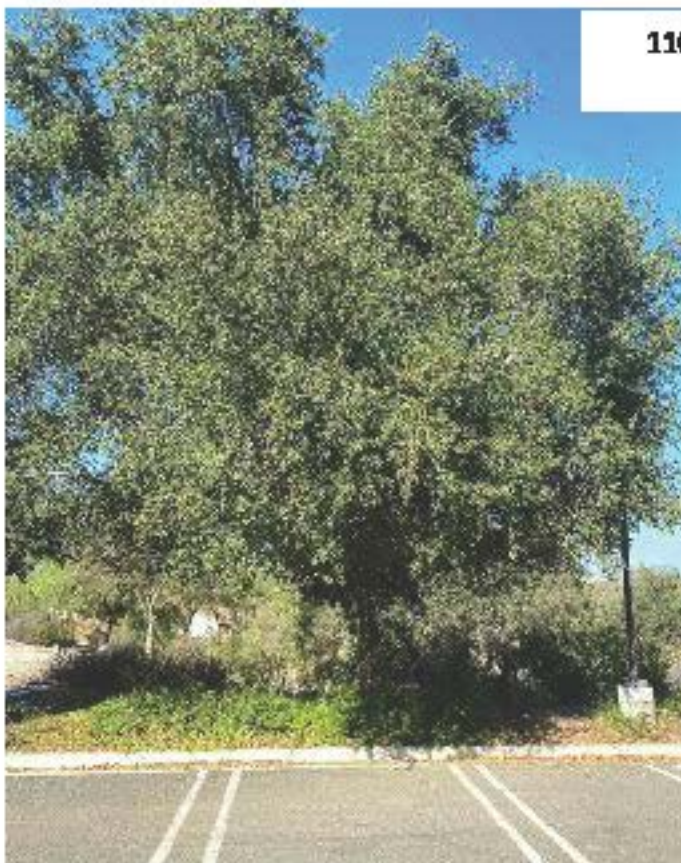
Oak tree #55 facing northeast



Sycamore tree #56 facing northeast

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



Oak tree #57 facing northeast



Oak tree #58 facing northeast

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



Oak tree #59 facing northeast



Oak tree #50 facing northeast

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



Oak tree #51 facing northeast



Oak tree #52 facing northeast

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



Oak tree #63 facing north



Oak tree #64 facing north

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



Oak tree #65 facing north



Oak trees #67 and #66 facing north

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



Oak tree #58 facing northeast



Oak tree #59 facing northeast

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



Oak tree #70 facing north



Oak tree #71 facing northwest

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



Oak tree #72 facing northwest



Oak tree #73 facing northeast

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



Oak tree #74 facing northwest



Oak tree #75 facing north

September 3, 2021

**1100 Rancho Conejo
Thousand Oaks**



Oak tree #76 facing north



Sycamore tree #77 facing south

September 3, 2021

SUMMARY OF FIELD OBSERVATIONS

| | TREE NUMBER | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 |
|--------------------|--------------------------|-----|-----|-------------------|-----|-----|-----|-----|-----|-----|-----|
| SPECIES | <i>Platanus racemosa</i> | X | X | X | X | X | X | | | | |
| | <i>Quercus agrifolia</i> | | | | | | | | | | |
| | <i>Quercus ilex</i> | | | | | | | X | X | | X |
| | <i>Quercus suber</i> | | | | | | | | | X | |
| DIMENSIONS | TREE HEIGHT | 60' | 70' | 45' | 45' | 50' | 50' | 30' | 25' | 25' | 18' |
| | CROWN SPREAD | | | | | | | | | | |
| | UNBALANCED CROWN | | | | | | | | | | |
| | LEAN DIRECTION | | | | | | | | | | |
| | TRUNK DIAMETER(S) | 27" | 38" | 17" 16" 16" | 28" | 30" | 20" | 14" | 11" | 21" | 10" |
| RATING | | | | | | | | | | | |
| | HEALTH | B | B | B | B | B | B | B | B | C- | C |
| | AESTHETICS/COMFORMITY | C | B | C | B | C | C | B | C | D | C |
| PHYSICAL CONDITION | VIGOR(LOW/ NORM/ HIGH) | H | H | N | H | N | N | N | N | L | N |
| | TRUNK CAVITY/DAMAGE | | | | | | | | | | X |
| | TRUNK SAP OOZE | | | | | | | | | | |
| | CODOMINANCE | | | X | | | | | | | |
| | CANKER(S) | | | | | | | | | | |
| | INCLUDED BARK | | | X | | | | | | | |
| | BURIED ROOT COLLAR | | | | | | | | | | |
| | CUT/DAMAGED ROOTS | | | | | | | | | | |
| | FUNGAL DISEASE | | | | | | | | | | |
| | INSECT DAMAGE | | | | | | | | | | |
| | MAINSTEM DIEBACK | | | | | | | | | | |
| | TWIG/BRANCH DIEBACK | | | | | | | | | | |
| | THIN CROWN | | | | | | X | | | X | X |
| | WEAK ATTACHMENT(S) | | | | | | | | | | |
| | BADLY PRUNED | X | | | | | | | | | |
| | BRANCH CAVITIES | | | | | | | | | | |
| | OVER-EXTENDED BRANCH | | | | | | | | | | |
| | EPICORMIC GROWTH | X | X | | | | X | | | X | X |
| | TERRAIN - SLOPED/LEVEL | L | L | L | L | L | L | S | S | L | L |

Surface roots. Trunk 10' from building.

Crowded by #8

Crowded by #7

Stake damage.

SUMMARY OF FIELD OBSERVATIONS

| | TREE NUMBER | 11 | 12 | 13 | 14 | 15 | 16 | 17 | 18 | 19 | 20 |
|--------------------|--------------------------|-----|-----|-----|------------|-----|----|-----|------------|-----|------------|
| SPECIES | <i>Platanus racemosa</i> | | | | X | | | | X | X | X |
| | <i>Quercus agrifolia</i> | | | | | X | X | X | | | |
| | <i>Quercus ilex</i> | X | | | | | | | | | |
| | <i>Quercus suber</i> | | X | X | | | | | | | |
| DIMENSIONS | TREE HEIGHT | 30' | 40' | 40' | 45' | 12' | 8' | 15' | 50' | 40' | 50' |
| | CROWN SPREAD | | | | | | | | | | |
| | UNBALANCED CROWN | | | | | | | | | | |
| | LEAN DIRECTION | | | | | | | | | | |
| | TRUNK DIAMETER(S) | 16" | 22" | 24" | 13" 11" | 7" | 4" | 8" | 20" 19" | 16" | 19" 14" |
| RATING | | | | | | | | | | | |
| | HEALTH | B | B | B | B | C | C | C | B | B | C |
| | AESTHETICS/COMFORMITY | C | B | C | B | C | D | C | B | B | C |
| PHYSICAL CONDITION | VIGOR(LOW/ NORM/ HIGH) | N | N | N | N | N | N | N | N | H | N |
| | TRUNK CAVITY/DAMAGE | | | | | | | | | | |
| | TRUNK SAP OOZE | | | | | | | | | | |
| | CODOMINANCE | | | | | | | | | | |
| | CANKER(S) | | | | | | | | | | |
| | INCLUDED BARK | | | | | | | | X | | |
| | BURIED ROOT COLLAR | | | | | | | | | | |
| | CUT/DAMAGED ROOTS | | | | | | | | | | |
| | FUNGAL DISEASE | | | | | X | | | | | |
| | INSECT DAMAGE | | | | | | | | | | |
| | MAINSTEM DIEBACK | | | | | | | | | | |
| | TWIG/BRANCH DIEBACK | | | | | | X | | | | |
| | THIN CROWN | | X | X | | | X | | | | |
| | WEAK ATTACHMENT(S) | | | | | | | | | | |
| | BADLY PRUNED | X | | | | | | | | | |
| | BRANCH CAVITIES | | | | | | | | | | |
| | OVER-EXTENDED BRANCH | | | | | | | | | | X |
| | EPICORMIC GROWTH | X | X | X | | | | | | | |
| | TERRAIN - SLOPED/LEVEL | L | L | L | L | S | S | S | L | L | L |

SUMMARY OF FIELD OBSERVATIONS

| | TREE NUMBER | 21 | 22 | 23 | 24 | 25 | 26 | 27 | 28 | 29 | 30 |
|--------------------|--------------------------|-----------|-----|------------|-----|-----|------------|------------|-----|------------|-----|
| SPECIES | <i>Platanus racemosa</i> | X | X | X | X | X | X | X | X | X | X |
| | <i>Quercus agrifolia</i> | | | | | | | | | | |
| | <i>Quercus ilex</i> | | | | | | | | | | |
| | <i>Quercus suber</i> | | | | | | | | | | |
| DIMENSIONS | TREE HEIGHT | 35' | 50' | 50' | 35' | 40' | 30' | 60' | 35' | 35' | 40' |
| | CROWN SPREAD | | | | | | | | | | |
| | UNBALANCED CROWN | | | | | X | | | | | |
| | LEAN DIRECTION | | | | | SW | | | | | |
| | TRUNK DIAMETER(S) | 11" 7" | 23" | 21" 17" | 13" | 15" | 15" 14" | 20" 12" | 17" | 16" 13" | 18" |
| RATING | HEALTH | C- | B | B | C- | B | C | B | C- | B | B |
| | AESTHETICS/COMFORMITY | D | B | C | D | C | D | B | C- | B | B |
| | | | | | | | | | | | |
| PHYSICAL CONDITION | VIGOR(LOW/ NORM/ HIGH) | L | N | N | L | N | L | H | L | H | H |
| | TRUNK CAVITY/DAMAGE | | | | X | | | | | | |
| | TRUNK SAP OOZE | | | | | | | | | | |
| | CODOMINANCE | | | X | | | X | X | | X | |
| | CANKER(S) | | | | | | | | | | |
| | INCLUDED BARK | | | | | | | | | | |
| | BURIED ROOT COLLAR | | | | | | | | | | |
| | CUT/DAMAGED ROOTS | | | | | | | | | | |
| | FUNGAL DISEASE | | | | | | | | | | |
| | INSECT DAMAGE | | | | | | | | | | |
| | MAINSTEM DIEBACK | | | | | | | | | | |
| | TWIG/BRANCH DIEBACK | X | | | X | | X | | X | | |
| | THIN CROWN | X | | | X | | X | | X | | |
| | WEAK ATTACHMENT(S) | | | | | | | | | | |
| | BADLY PRUNED | | | | X | | | | | | |
| | BRANCH CAVITIES | | | | | | | | | | |
| | OVER-EXTENDED BRANCH | | | | | | | | | | |
| | EPICORMIC GROWTH | X | | | X | X | X | X | | | |
| | TERRAIN - SLOPED/LEVEL | L | L | L | L | L | S | S | L | L | L |

SUMMARY OF FIELD OBSERVATIONS

| | TREE NUMBER | 31 | 32 | 33 | 34 | 35 | 36 | 37 | 38 | 39 | 40 |
|--------------------|--------------------------|------------------------|------------------|-----|------------|-----|-----|-----|----------|-----|-----|
| SPECIES | <i>Platanus racemosa</i> | X | X | X | X | X | | | | | |
| | <i>Quercus agrifolia</i> | | | | | | X | X | X | X | X |
| | <i>Quercus ilex</i> | | | | | | | | | | |
| | <i>Quercus suber</i> | | | | | | | | | | |
| | | | | | | | | | | | |
| DIMENSIONS | TREE HEIGHT | 40' | 60' | 60' | 35' | 35' | 30' | 12' | 20' | 18' | 30' |
| | CROWN SPREAD | | | | | | | | | | |
| | UNBALANCED CROWN | | | | | | | | | | |
| | LEAN DIRECTION | | | | | | | | | | |
| | TRUNK DIAMETER(S) | 18" 12" 8" 7" | 36" 13" 8" | 27" | 22" 16" | 20" | 28" | 4" | 7" 5" | 3" | 19" |
| RATING | | | | | | | | | | | |
| | HEALTH | B | C | B | B | B | C | B | B | B | B |
| | AESTHETICS/COMFORMITY | C | C | B | B | B | C | C | B | B | B |
| PHYSICAL CONDITION | VIGOR(LOW/ NORM/ HIGH) | H | N | N | H | H | N | N | H | H | H |
| | TRUNK CAVITY/DAMAGE | | | | | | | | | | |
| | TRUNK SAP OOZE | | | | | | | | | | |
| | CODOMINANCE | X | | | X | | X | | X | | |
| | CANKER(S) | | | | | | | | | | |
| | INCLUDED BARK | | | | X | | | | | | |
| | BURIED ROOT COLLAR | | | | | | | | | | |
| | CUT/DAMAGED ROOTS | | | | | | | | | | |
| | FUNGAL DISEASE | | | | | | | | | | |
| | INSECT DAMAGE | | | | | | | | | | |
| | MAINSTEM DIEBACK | | | | | | | | | | |
| | TWIG/BRANCH DIEBACK | | X | | | | X | | | | |
| | THIN CROWN | | X | | | | X | | | | |
| | WEAK ATTACHMENT(S) | | | | | | X | | | | |
| | BADLY PRUNED | | X | | | | | | | | |
| | BRANCH CAVITIES | | | | | | | | | | |
| | OVER-EXTENDED BRANCH | | | | | | | | | | |
| | EPICORMIC GROWTH | | X | | | | | | | | |
| | TERRAIN - SLOPED/LEVEL | L | L | L | L | L | L | L | L | L | L |
| | | | | | | | | | | | |

Water pocket.

SUMMARY OF FIELD OBSERVATIONS

| | TREE NUMBER | 41 | 42 | 43 | 44 | 45 | 46 | 47 | 48 | 49 | 50 |
|--------------------|-------------------------------|-----|-----|----------------|----------|----------|-----|-----|-----|-----|-----|
| SPECIES | <i>Juglans californica</i> | | | | | | | | | | |
| | <i>Quercus berberidifolia</i> | | | | | | | | | | |
| | <i>Quercus agrifolia</i> | X | X | X | X | X | X | X | X | X | X |
| | <i>Quercus lobata</i> | | | | | | | | | | |
| DIMENSIONS | TREE HEIGHT | 25' | 25' | 30' | 30' | 30' | 15' | 15' | 18' | 10' | 30' |
| | CROWN SPREAD | | | | | | | | | | |
| | UNBALANCED CROWN | | | | | | | | | | |
| | LEAN DIRECTION | | | | | | | | | | |
| | TRUNK DIAMETER(S) | 11" | 12" | 9" 9" 6" | 8" 6" | 7" 6" | 4" | 9" | 8" | 3" | 16" |
| RATING | HEALTH | B | B | C | C | C | C- | C | C | C | C |
| | AESTHETICS/COMFORMITY | A | B | C | C | C | C- | C | C | C | C |
| | VIGOR(LOW/ NORM/ HIGH) | H | H | N | N | N | L | N | N | N | N |
| PHYSICAL CONDITION | TRUNK CAVITY/DAMAGE | | | | | | | | | | |
| | TRUNK SAP OOZE | | | | | | | | | | |
| | CODOMINANCE | | | | | | | | | | X |
| | CANKER(S) | | | | | | | | | | |
| | INCLUDED BARK | | | | | | | | | | |
| | BURIED ROOT COLLAR | | | | | | | | | | |
| | CUT/DAMAGED ROOTS | | | | | | | | | | |
| | FUNGAL DISEASE | | | | | | | | | | |
| | INSECT DAMAGE | | | | | | | | | | |
| | MAINSTEM DIEBACK | | | | | | | | | | |
| | TWIG/BRANCH DIEBACK | | | | | | X | | | | X |
| | THIN FOLIAGE | | | X | X | X | X | | | | X |
| | WEAK ATTACHMENT(S) | | | | | | | | | | |
| | BADLY PRUNED | | | | | | | | | | |
| | BRANCH CAVITIES | | | | | | | | | | |
| | OVER-EXTENDED BRANCH | | | | | | | | | | |
| | EPICORMIC GROWTH | | | | | | | | | | |
| | TERRAIN - SLOPED/LEVEL | L | L | S | S | S | S | L | L | L | L |

SUMMARY OF FIELD OBSERVATIONS

| | TREE NUMBER | 51 | 52 | 53 | 54 | 55 | 56 | 57 | 58 | 59 | 60 |
|--------------------|--------------------------|-----|----------------------|-----|-----|-----|-----|-----|-----|-----|-----|
| SPECIES | <i>Platanus racemosa</i> | | | | | | X | | | | |
| | <i>Quercus agrifolia</i> | X | X | X | X | X | | X | X | X | X |
| | <i>Quercus ilex</i> | | | | | | | | | | |
| | <i>Quercus suber</i> | | | | | | | | | | |
| DIMENSIONS | TREE HEIGHT | 25' | 12' | 30' | 25' | 30' | 30' | 30' | 25' | 25' | 20' |
| | CROWN SPREAD | | | | | | | | | | |
| | UNBALANCED CROWN | | | | | | | | | | |
| | LEAN DIRECTION | | | | | | | | | | |
| | TRUNK DIAMETER(S) | 14" | 3" 3" 2" 1" | 12" | 11" | 15" | 18" | 14" | 11" | 12" | 12" |
| RATING | | | | | | | | | | | |
| | HEALTH | C | B | B | C | B | C | B | C | B | C |
| | AESTHETICS/COMFORMITY | C | C | C | C | B | C | C | C | B | C |
| PHYSICAL CONDITION | VIGOR(LOW/ NORM/ HIGH) | N | N | N | N | N | N | N | N | N | N |
| | TRUNK CAVITY/DAMAGE | | | | | | | | X | | X |
| | TRUNK SAP OOZE | | | | | | | | | | |
| | CODOMINANCE | | | | | | | | | | |
| | CANKER(S) | | | | | | | | | | |
| | INCLUDED BARK | | | | | | | | | | |
| | BURIED ROOT COLLAR | | | | | | | | | | |
| | CUT/DAMAGED ROOTS | | | | | | | | | | |
| | FUNGAL DISEASE | | | | | | | | | | |
| | INSECT DAMAGE | | | | | | | | | | |
| | MAINSTEM DIEBACK | | | | | | | | | | |
| | TWIG/BRANCH DIEBACK | X | | X | X | | | | X | | |
| | THIN CROWN | X | | | | | X | | X | | |
| | WEAK ATTACHMENT(S) | | | | | | | | | | |
| | BADLY PRUNED | | | | | | | | | | |
| | BRANCH CAVITIES | | | | | | | | | | |
| | OVER-EXTENDED BRANCH | | | | | | | | | | |
| | EPICORMIC GROWTH | | | | | | | | | | |
| | TERRAIN - SLOPED/LEVEL | L | S | L | L | L | L | L | L | L | L |

SUMMARY OF FIELD OBSERVATIONS

| | TREE NUMBER | 61 | 62 | 63 | 64 | 65 | 66 | 67 | 68 | 69 | 70 |
|--------------------|--------------------------|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|
| SPECIES | <i>Platanus racemosa</i> | | | | | | | | | | |
| | <i>Quercus agrifolia</i> | X | X | X | X | X | X | X | X | X | X |
| | <i>Quercus ilex</i> | | | | | | | | | | |
| | <i>Quercus suber</i> | | | | | | | | | | |
| DIMENSIONS | TREE HEIGHT | 20' | 18' | 15' | 15' | 25' | 30' | 25' | 30' | 25' | 20' |
| | CROWN SPREAD | | | | | | | | | | |
| | UNBALANCED CROWN | | | | | | | | | | |
| | LEAN DIRECTION | | | | | | | | | | |
| | TRUNK DIAMETER(S) | 12" | 11" | 9" | 5" | 9" | 13" | 6" | 14" | 10" | 9" |
| RATING | HEALTH | B | C | C | C | B | C | B | C | B | C |
| | AESTHETICS/COMFORMITY | B | C | C | C | C | C | C | C | B | C |
| | VIGOR(LOW/ NORM/ HIGH) | N | N | L | N | N | N | N | N | N | N |
| PHYSICAL CONDITION | TRUNK CAVITY/DAMAGE | | | X | | | | | X | | |
| | TRUNK SAP OOZE | | | | | | | | | | |
| | CODOMINANCE | | | | | | | | | | |
| | CANKER(S) | | | | | | | | | | |
| | INCLUDED BARK | | | | | | | | | | |
| | BURIED ROOT COLLAR | | | | | | | | | | |
| | CUT/DAMAGED ROOTS | | | | | | | | | | |
| | FUNGAL DISEASE | | | | | | | | X | | |
| | INSECT DAMAGE | | | | | | | | | | |
| | MAINSTEM DIEBACK | | | | | | | | | | |
| | TWIG/BRANCH DIEBACK | | | X | X | | | | X | | |
| | THIN CROWN | | | X | | | | | X | | |
| | WEAK ATTACHMENT(S) | | | | | | | | | | |
| | BADLY PRUNED | | | | | | | | | | |
| | BRANCH CAVITIES | | | X | | | | | | | |
| | OVER-EXTENDED BRANCH | | | | | | | | | | |
| | EPICORMIC GROWTH | | | | | | | | | | |
| | TERRAIN - SLOPED/LEVEL | L | L | S | S | L | S | S | L | L | L |

SUMMARY OF FIELD OBSERVATIONS

| | TREE NUMBER | 71 | 72 | 73 | 74 | 75 | 76 | 77 | | | | | | |
|------------------------|--------------------------|-----|----------------|---------------------|-----|-----|-----|-----|-----------|--|--|--|--|--|
| SPECIES | <i>Platanus racemosa</i> | | | | | | | X | | | | | | |
| | <i>Quercus agrifolia</i> | X | X | X | X | X | X | | | | | | | |
| | <i>Quercus ilex</i> | | | | | | | | | | | | | |
| | <i>Quercus suber</i> | | | | | | | | | | | | | |
| DIMENSIONS | TREE HEIGHT | 25' | 12' | 20' | 25' | 15' | 25' | 50' | | | | | | |
| | CROWN SPREAD | | | | | | | | | | | | | |
| | UNBALANCED CROWN | | | | | | X | | | | | | | |
| | LEAN DIRECTION | | | | | | | | | | | | | |
| | TRUNK DIAMETER(S) | 6" | 6" 5" 5" | 10" | 11" | 9" | 14" | 18" | | | | | | |
| RATING | | | | | | | | | | | | | | |
| | HEALTH | B | B | B | B | B | B | C- | | | | | | |
| | AESTHETICS/COMFORMITY | C | C | C | B | C | C | C- | | | | | | |
| PHYSICAL CONDITION | VIGOR(LOW/ NORM/ HIGH) | N | N | N | N | N | N | L | | | | | | |
| | TRUNK CAVITY/DAMAGE | | | | | | | | | | | | | |
| | TRUNK SAP OOZE | | | | | | | | | | | | | |
| | CODOMINANCE | | | | | | | | | | | | | |
| | CANKER(S) | | | | | | | | | | | | | |
| | INCLUDED BARK | | | | | | | | | | | | | |
| | BURIED ROOT COLLAR | | | | | | | | | | | | | |
| | CUT/DAMAGED ROOTS | | | | | | | | | | | | | |
| | FUNGAL DISEASE | | | | | | | | | | | | | |
| | INSECT DAMAGE | | | | | | | | | | | | | |
| | MAINSTEM DIEBACK | | | | | | | | | | | | | |
| | TWIG/BRANCH DIEBACK | | | | | | | X | | | | | | |
| | THIN CROWN | X | | | | | | X | | | | | | |
| | WEAK ATTACHMENT(S) | | | | | | | | | | | | | |
| | BADLY PRUNED | | | | | | | | | | | | | |
| | BRANCH CAVITIES | | | | | | | | | | | | | |
| | OVER-EXTENDED BRANCH | | | | | | | | | | | | | |
| | EPICORMIC GROWTH | | | | | | | | | | | | | |
| TERRAIN - SLOPED/LEVEL | S | S | S | Swollen trunk. S | S | S | S | L | Mistletoe | | | | | |

DRIPLINE MEASUREMENTS

| TREE NO. | DRIPLINE | N | NE | E | SE | S | SW | W | NW |
|----------------------------------|----------|-----|-----|-----|-----|-----|-----|-----|-----|
| 1 HEIGHT TO CANOPY | HORIZ. | 27' | 16' | 17' | 16' | 15' | 11' | 15' | 17' |
| | VERT. | 40' | 20' | 20' | 8' | 8' | 7' | 40' | 40' |
| 2 HEIGHT TO CANOPY | HORIZ. | 30' | 30' | 28' | 34' | 40' | 25' | 26' | 27' |
| | VERT. | 35' | 35' | 35' | 20' | 25' | 18' | 15' | 15' |
| 3 HEIGHT TO CANOPY | HORIZ. | 16' | 17' | 16' | 8' | 15' | 26' | 24' | 27' |
| | VERT. | 20' | 30' | 30' | 15' | 12' | 15' | 20' | 20' |
| 4 HEIGHT TO CANOPY | HORIZ. | 19' | 20' | 23' | 25' | 29' | 27' | 19' | 16' |
| | VERT. | 12' | 10' | 20' | 15' | 15' | 12' | 12' | 15' |
| 5 HEIGHT TO CANOPY | HORIZ. | 25' | 22' | 0' | 15' | 27' | 25' | 29' | 30' |
| | VERT. | 20' | 20' | 0' | 8' | 8' | 8' | 8' | 7' |
| 6 HEIGHT TO CANOPY | HORIZ. | 12' | 12' | 12' | 16' | 19' | 4' | 14' | 10' |
| | VERT. | 15' | 20' | 20' | 15' | 9' | 18' | 15' | 15' |
| 7 HEIGHT TO CANOPY | HORIZ. | 12' | 15' | 17' | 14' | 19' | 17' | 15' | 12' |
| | VERT. | 12' | 6' | 7' | 6' | 7' | 7' | 7' | 7' |
| 8 HEIGHT TO CANOPY | HORIZ. | 5' | 11' | 11' | 8' | 8' | 6' | 6' | 4' |
| | VERT. | 2' | 15' | 15' | 6' | 6' | 6' | 6' | 6' |
| 9 HEIGHT TO CANOPY | HORIZ. | 9' | 10' | 22' | 23' | 19' | 17' | 12' | 12' |
| | VERT. | 15' | 15' | 9' | 9' | 12' | 12' | 12' | 12' |
| 10 HEIGHT TO CANOPY | HORIZ. | 13' | 14' | 13' | 13' | 13' | 14' | 13' | 13' |
| | VERT. | 7' | 7' | 7' | 7' | 7' | 7' | 7' | 12' |

DRIPLINE MEASUREMENTS

| TREE NO. | DRIPLINE | N | NE | E | SE | S | SW | W | NW |
|----------------------------------|----------|-----|-----|-----|-----|-----|-----|-----|-----|
| 11 HEIGHT TO CANOPY | HORIZ. | 19' | 19' | 23' | 24' | 23' | 19' | 19' | 19' |
| | VERT. | 8' | 8' | 12' | 12' | 12' | 8' | 8' | 8' |
| 12 HEIGHT TO CANOPY | HORIZ. | 20' | 9' | 20' | 17' | 20' | 20' | 18' | 17' |
| | VERT. | 8' | 8' | 25' | 25' | 12' | 10' | 15' | 20' |
| 13 HEIGHT TO CANOPY | HORIZ. | 23' | 24' | 28' | 22' | 26' | 12' | 18' | 25' |
| | VERT. | 12' | 20' | 20' | 15' | 18' | 15' | 12' | 15' |
| 14 HEIGHT TO CANOPY | HORIZ. | 16' | 16' | 18' | 15' | 15' | 15' | 15' | 16' |
| | VERT. | 15' | 20' | 18' | 10' | 8' | 10' | 15' | 15' |
| 15 HEIGHT TO CANOPY | HORIZ. | 6' | 6' | 6' | 6' | 6' | 6' | 6' | 6' |
| | VERT. | 3' | 3' | 3' | 3' | 3' | 3' | 3' | 3' |
| 16 HEIGHT TO CANOPY | HORIZ. | 5' | 5' | 5' | 5' | 5' | 5' | 5' | 5' |
| | VERT. | 3' | 3' | 3' | 3' | 3' | 3' | 3' | 3' |
| 17 HEIGHT TO CANOPY | HORIZ. | 12' | 12' | 12' | 12' | 13' | 10' | 11' | 11' |
| | VERT. | 5' | 5' | 6' | 6' | 6' | 5' | 4' | 5' |
| 18 HEIGHT TO CANOPY | HORIZ. | 15' | 15' | 17' | 21' | 23' | 23' | 19' | 18' |
| | VERT. | 15' | 15' | 12' | 20' | 20' | 12' | 18' | 20' |
| 19 HEIGHT TO CANOPY | HORIZ. | 15' | 15' | 15' | 15' | 15' | 15' | 15' | 15' |
| | VERT. | 10' | 10' | 10' | 10' | 10' | 10' | 10' | 10' |
| 20 HEIGHT TO CANOPY | HORIZ. | 18' | 21' | 19' | 27' | 24' | 37' | 25' | 13' |
| | VERT. | 35' | 20' | 20' | 20' | 20' | 20' | 35' | 35' |

DRIPLINE MEASUREMENTS

| TREE NO. | DRIPLINE | N | NE | E | SE | S | SW | W | NW |
|----------------------------------|----------|-----|-----|-----|-----|-----|-----|-----|-----|
| 21 HEIGHT TO CANOPY | HORIZ. | 6' | 13' | 7' | 13' | 9' | 12' | 16' | 8' |
| | VERT. | 18' | 8' | 10' | 15' | 12' | 10' | 20' | 20' |
| 22 HEIGHT TO CANOPY | HORIZ. | 24' | 20' | 26' | 25' | 30' | 13' | 15' | 21' |
| | VERT. | 15' | 15' | 18' | 18' | 30' | 25' | 8' | 15' |
| 23 HEIGHT TO CANOPY | HORIZ. | 13' | 17' | 25' | 35' | 29' | 28' | 27' | 20' |
| | VERT. | 20' | 15' | 15' | 30' | 15' | 15' | 12' | 15' |
| 24 HEIGHT TO CANOPY | HORIZ. | 0' | 2' | 3' | 2' | 9' | 10' | 11' | 10' |
| | VERT. | 0' | 9' | 8' | 6' | 8' | 8' | 20' | 20' |
| 25 HEIGHT TO CANOPY | HORIZ. | 6' | 6' | 4' | 14' | 30' | 23' | 12' | 8' |
| | VERT. | 10' | 10' | 9' | 10' | 25' | 20' | 18' | 18' |
| 26 HEIGHT TO CANOPY | HORIZ. | 4' | 8' | 8' | 23' | 22' | 20' | 20' | 16' |
| | VERT. | 10' | 10' | 10' | 10' | 12' | 12' | 15' | 12' |
| 27 HEIGHT TO CANOPY | HORIZ. | 27' | 24' | 15' | 16' | 20' | 24' | 24' | 20' |
| | VERT. | 12' | 12' | 6' | 10' | 15' | 10' | 10' | 10' |
| 28 HEIGHT TO CANOPY | HORIZ. | 2' | 12' | 4' | 3' | 2' | 15' | 17' | 14' |
| | VERT. | 8' | 8' | 8' | 8' | 8' | 6' | 6' | 6' |
| 29 HEIGHT TO CANOPY | HORIZ. | 16' | 15' | 19' | 17' | 17' | 11' | 19' | 22' |
| | VERT. | 10' | 9' | 6' | 7' | 6' | 9' | 8' | 8' |
| 30 HEIGHT TO CANOPY | HORIZ. | 18' | 14' | 9' | 10' | 6' | 6' | 10' | 10' |
| | VERT. | 10' | 12' | 10' | 10' | 10' | 10' | 10' | 10' |

DRIPLINE MEASUREMENTS

| TREE NO. | DRIPLINE | N | NE | E | SE | S | SW | W | NW |
|----------------------------------|----------|-----|-----|-----|-----|-----|-----|-----|-----|
| 31 HEIGHT TO CANOPY | HORIZ. | 23' | 18' | 14' | 13' | 20' | 14' | 8' | 11' |
| | VERT. | 15' | 12' | 10' | 9' | 9' | 12' | 12' | 10' |
| 32 HEIGHT TO CANOPY | HORIZ. | 14' | 5' | 11' | 18' | 23' | 18' | 18' | 29' |
| | VERT. | 12' | 10' | 8' | 15' | 25' | 30' | 18' | 15' |
| 33 HEIGHT TO CANOPY | HORIZ. | 24' | 25' | 28' | 20' | 12' | 8' | 8' | 10' |
| | VERT. | 20' | 12' | 30' | 25' | 30' | 12' | 9' | 15' |
| 34 HEIGHT TO CANOPY | HORIZ. | 17' | 14' | 19' | 16' | 10' | 9' | 11' | 11' |
| | VERT. | 12' | 12' | 10' | 12' | 20' | 18' | 15' | 15' |
| 35 HEIGHT TO CANOPY | HORIZ. | 11' | 10' | 10' | 13' | 15' | 15' | 15' | 15' |
| | VERT. | 12' | 10' | 10' | 12' | 12' | 12' | 15' | 15' |
| 36 HEIGHT TO CANOPY | HORIZ. | 20' | 27' | 38' | 34' | 32' | 24' | 25' | 25' |
| | VERT. | 12' | 5' | 2' | 2' | 2' | 4' | 4' | 2' |
| 37 HEIGHT TO CANOPY | HORIZ. | 4' | 8' | 8' | 4' | 4' | 4' | 4' | 4' |
| | VERT. | 1' | 6' | 6' | 1' | 1' | 1' | 1' | 1' |
| 38 HEIGHT TO CANOPY | HORIZ. | 13' | 9' | 4' | 4' | 4' | 9' | 11' | 12' |
| | VERT. | 6' | 6' | 3' | 4' | 4' | 1' | 1' | 3' |
| 39 HEIGHT TO CANOPY | HORIZ. | 4' | 3' | 1' | 1' | 1' | 3' | 7' | 7' |
| | VERT. | 6' | 6' | 2' | 2' | 2' | 2' | 5' | 8' |
| 40 HEIGHT TO CANOPY | HORIZ. | 24' | 18' | 18' | 15' | 21' | 23' | 23' | 20' |
| | VERT. | 15' | 20' | 20' | 6' | 1' | 1' | 1' | 18' |

DRIPLINE MEASUREMENTS

| TREE NO. | DRIPLINE | N | NE | E | SE | S | SW | W | NW |
|----------------------------------|----------|-----|-----|-----|-----|-----|-----|-----|-----|
| 41 HEIGHT TO CANOPY | HORIZ. | 11' | 15' | 15' | 15' | 17' | 12' | 10' | 10' |
| | VERT. | 10' | 8' | 6' | 5' | 3' | 3' | 6' | 6' |
| 42 HEIGHT TO CANOPY | HORIZ. | 14' | 14' | 10' | 15' | 14' | 19' | 19' | 18' |
| | VERT. | 1' | 4' | 5' | 5' | 2' | 3' | 2' | 1' |
| 43 HEIGHT TO CANOPY | HORIZ. | 16' | 14' | 14' | 15' | 15' | 13' | 10' | 12' |
| | VERT. | 2' | 6' | 10' | 8' | 2' | 2' | 2' | 1' |
| 44 HEIGHT TO CANOPY | HORIZ. | 13' | 13' | 13' | 13' | 13' | 13' | 13' | 13' |
| | VERT. | 3' | 3' | 3' | 3' | 3' | 3' | 3' | 3' |
| 45 HEIGHT TO CANOPY | HORIZ. | 12' | 12' | 12' | 12' | 12' | 12' | 12' | 12' |
| | VERT. | 2' | 2' | 2' | 2' | 2' | 2' | 2' | 2' |
| 46 HEIGHT TO CANOPY | HORIZ. | 6' | 6' | 6' | 6' | 6' | 6' | 6' | 6' |
| | VERT. | 2' | 2' | 2' | 2' | 2' | 2' | 2' | 2' |
| 47 HEIGHT TO CANOPY | HORIZ. | 15' | 15' | 16' | 16' | 12' | 10' | 9' | 9' |
| | VERT. | 4' | 3' | 2' | 2' | 4' | 3' | 3' | 3' |
| 48 HEIGHT TO CANOPY | HORIZ. | 8' | 14' | 12' | 5' | 5' | 7' | 6' | 5' |
| | VERT. | 8' | 1' | 3' | 6' | 6' | 8' | 3' | 3' |
| 49 HEIGHT TO CANOPY | HORIZ. | 7' | 9' | 6' | 0' | 0' | 0' | 0' | 6' |
| | VERT. | 2' | 2' | 2' | 0' | 0' | 0' | 0' | 2' |
| 50 HEIGHT TO CANOPY | HORIZ. | 15' | 15' | 15' | 12' | 25' | 24' | 20' | 20' |
| | VERT. | 10' | 10' | 5' | 5' | 5' | 5' | 5' | 20' |

DRIPLINE MEASUREMENTS

| TREE NO. | DRIPLINE | N | NE | E | SE | S | SW | W | NW |
|----------------------------------|----------|-----|-----|-----|-----|-----|-----|-----|-----|
| 51 HEIGHT TO CANOPY | HORIZ. | 12' | 12' | 10' | 6' | 10' | 19' | 18' | 18' |
| | VERT. | 3' | 3' | 6' | 8' | 10' | 7' | 6' | 8' |
| 52 HEIGHT TO CANOPY | HORIZ. | 5' | 5' | 5' | 5' | 5' | 5' | 5' | 5' |
| | VERT. | 2' | 2' | 2' | 2' | 2' | 2' | 2' | 2' |
| 53 HEIGHT TO CANOPY | HORIZ. | 8' | 9' | 9' | 19' | 19' | 19' | 19' | 20' |
| | VERT. | 6' | 5' | 12' | 5' | 6' | 8' | 8' | 8' |
| 54 HEIGHT TO CANOPY | HORIZ. | 10' | 13' | 11' | 12' | 12' | 13' | 9' | 10' |
| | VERT. | 6' | 6' | 6' | 7' | 7' | 6' | 6' | 6' |
| 55 HEIGHT TO CANOPY | HORIZ. | 14' | 17' | 17' | 24' | 18' | 18' | 14' | 14' |
| | VERT. | 6' | 6' | 7' | 6' | 7' | 7' | 8' | 7' |
| 56 HEIGHT TO CANOPY | HORIZ. | 24' | 20' | 20' | 24' | 23' | 20' | 15' | 18' |
| | VERT. | 15' | 5' | 15' | 8' | 9' | 7' | 10' | 5' |
| 57 HEIGHT TO CANOPY | HORIZ. | 23' | 23' | 21' | 18' | 20' | 20' | 15' | 20' |
| | VERT. | 9' | 6' | 9' | 6' | 6' | 6' | 6' | 15' |
| 58 HEIGHT TO CANOPY | HORIZ. | 12' | 14' | 6' | 6' | 5' | 13' | 15' | 17' |
| | VERT. | 8' | 8' | 15' | 15' | 8' | 7' | 6' | 9' |
| 59 HEIGHT TO CANOPY | HORIZ. | 7' | 6' | 10' | 14' | 17' | 14' | 10' | 10' |
| | VERT. | 6' | 6' | 6' | 6' | 6' | 6' | 6' | 6' |
| 60 HEIGHT TO CANOPY | HORIZ. | 9' | 8' | 8' | 9' | 17' | 15' | 17' | 17' |
| | VERT. | 6' | 6' | 6' | 6' | 6' | 6' | 6' | 6' |

DRIPLINE MEASUREMENTS

| TREE NO. | DRIPLINE | N | NE | E | SE | S | SW | W | NW |
|----------------------------------|----------|-----|-----|-----|-----|-----|-----|-----|-----|
| 61 HEIGHT TO CANOPY | HORIZ. | 14' | 12' | 12' | 15' | 13' | 12' | 14' | 17' |
| | VERT. | 6' | 6' | 6' | 6' | 6' | 6' | 6' | 6' |
| 62 HEIGHT TO CANOPY | HORIZ. | 8' | 8' | 8' | 9' | 11' | 11' | 9' | 8' |
| | VERT. | 10' | 10' | 6' | 6' | 8' | 8' | 6' | 6' |
| 63 HEIGHT TO CANOPY | HORIZ. | 11' | 4' | 4' | 6' | 6' | 11' | 13' | 13' |
| | VERT. | 8' | 6' | 6' | 8' | 10' | 6' | 6' | 8' |
| 64 HEIGHT TO CANOPY | HORIZ. | 6' | 6' | 8' | 9' | 9' | 7' | 3' | 3' |
| | VERT. | 4' | 4' | 1' | 1' | 1' | 1' | 3' | 5' |
| 65 HEIGHT TO CANOPY | HORIZ. | 10' | 10' | 10' | 10' | 12' | 12' | 8' | 8' |
| | VERT. | 6' | 6' | 6' | 6' | 5' | 5' | 10' | 10' |
| 66 HEIGHT TO CANOPY | HORIZ. | 15' | 15' | 15' | 15' | 15' | 15' | 15' | 15' |
| | VERT. | 2' | 2' | 2' | 2' | 2' | 2' | 2' | 2' |
| 67 HEIGHT TO CANOPY | HORIZ. | 3' | 3' | 5' | 6' | 10' | 12' | 9' | 3' |
| | VERT. | 8' | 8' | 1' | 1' | 1' | 5' | 8' | 8' |
| 68 HEIGHT TO CANOPY | HORIZ. | 12' | 11' | 11' | 19' | 12' | 0' | 17' | 18' |
| | VERT. | 10' | 6' | 6' | 8' | 12' | 0' | 6' | 8' |
| 69 HEIGHT TO CANOPY | HORIZ. | 15' | 9' | 12' | 14' | 16' | 16' | 16' | 15' |
| | VERT. | 9' | 6' | 7' | 7' | 6' | 5' | 8' | 9' |
| 70 HEIGHT TO CANOPY | HORIZ. | 16' | 8' | 11' | 12' | 16' | 14' | 16' | 16' |
| | VERT. | 9' | 6' | 6' | 6' | 6' | 6' | 8' | 8' |

DRIPLINE MEASUREMENTS

| TREE NO. | DRIPLINE | N | NE | E | SE | S | SW | W | NW |
|----------------------------------|----------|-----|-----|-----|-----|-----|-----|-----|-----|
| 71 HEIGHT TO CANOPY | HORIZ. | 10' | 10' | 8' | 4' | 4' | 4' | 8' | 10' |
| | VERT. | 7' | 10' | 5' | 3' | 3' | 6' | 10' | 10' |
| 72 HEIGHT TO CANOPY | HORIZ. | 3' | 3' | 3' | 8' | 10' | 9' | 11' | 10' |
| | VERT. | 4' | 4' | 4' | 1' | 1' | 2' | 3' | 5' |
| 73 HEIGHT TO CANOPY | HORIZ. | 16' | 16' | 16' | 14' | 15' | 16' | 18' | 18' |
| | VERT. | 12' | 8' | 6' | 6' | 7' | 8' | 9' | 10' |
| 74 HEIGHT TO CANOPY | HORIZ. | 15' | 15' | 15' | 17' | 14' | 10' | 14' | 14' |
| | VERT. | 6' | 4' | 6' | 6' | 6' | 10' | 6' | 6' |
| 75 HEIGHT TO CANOPY | HORIZ. | 16' | 13' | 11' | 9' | 9' | 8' | 9' | 14' |
| | VERT. | 9' | 8' | 6' | 5' | 5' | 4' | 6' | 7' |
| 76 HEIGHT TO CANOPY | HORIZ. | 7' | 2' | 5' | 11' | 21' | 20' | 18' | 10' |
| | VERT. | 8' | 10' | 8' | 6' | 15' | 10' | 12' | 8' |
| 77 HEIGHT TO CANOPY | HORIZ. | 17' | 15' | 20' | 27' | 19' | 20' | 17' | 16' |
| | VERT. | 18' | 12' | 15' | 9' | 10' | 7' | 9' | 8' |
| HEIGHT TO CANOPY | HORIZ. | | | | | | | | |
| | VERT. | | | | | | | | |
| HEIGHT TO CANOPY | HORIZ. | | | | | | | | |
| | VERT. | | | | | | | | |
| HEIGHT TO CANOPY | HORIZ. | | | | | | | | |
| | VERT. | | | | | | | | |

GLOSSARY

INTRODUCTION

Familiarity with the following definitions is necessary to the basic understanding of the tree ordinance, this tree report, and of the procedures used to evaluate the trees and the site conditions. There are numerous diseases and insects that frequently attack trees. A long discourse in plant pathology or entomology is not a prerequisite to develop a basic understanding of the effects of disease and insects upon living plant tissue but a basic knowledge of disease and insects should include an understanding of the following definitions:

SPECIES/DIMENSIONS

1. **Tree Number** - each protected tree in the field has been assigned a number that corresponds to a tree location on the Tree Location Map.
2. **Species** - is the type of tree that is being evaluated.
3. **Trunk Diameter** - as measured at 4½' above mean natural grade or, traditionally, DBH (diameter at breast height). This may be altered if the measurement cannot be made at 4½' feet or if makes sense to measure above or below that point.
4. **Tree Height** - is the approximate height of each assessed tree.
5. **Crown Spread** - is the approximate, average diameter of the crown or canopy.
6. **Lean Direction** - is the direction the tree is inclined from the natural vertical position.

PHYSICAL CONDITION

1. **Vigor** - is the capacity of a tree for growth and survival. Below are the ratings:

Low - Little new tip growth; poor leaf color; abnormal bark; much dead wood; significantly thinning foliage.

Normal - New tip growth; good leaf color; some insect damage and twig dieback; no significant dieback;

High - New tip growth; good leaf color; dense foliage; usually found in younger trees;

A vigorous tree will more easily ward off disease and/or insect attacks, and should recover from impacts more quickly than a less vigorous tree.

2. **Trunk Cavity/Damage** - A cavity is a hollow area in the trunk, usually due to fire or wood decay. Damage is a damaged area on the trunk, usually due to an external (abiotic) force on the tree.
3. **Water Pocket** - pockets formed at branch crotches that can hold water and possibly weaken the tree's structure (possible hazard).
4. **Trunk Sap Ooze** - the exudation of liquid, usually from wounds; trunk sap ooze.
5. **Codominance** – equal in size and importance, usually associated with either trunks/stems or scaffold limbs/branches in the crown. Often can and should be corrected by pruning.
6. **Included Bark** - bark that is embedded between a branch and its parent stem or between codominant stems causing a weak attachment.
7. **Buried Root Collar** - the root collar is the transition area between the bark and the trunk. Burying the root collar may lead to fungal infection.
8. **Fungal Disease** - diseases that attack live tissue/external signs (i.e. mushrooms, conks) of internal wood decay.

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9. **Insect Damage** - is some form of damage to the parts of the tree caused by insects or mites (e.g. scale, caterpillars, weevils, borers, mites, etc.).
10. **Mainstem Dieback** - death of healthy mainstems from the growing tip back.
11. **Twig/Branch Dieback** - death of twigs from the growing tip back.
12. **Thin Foliage** - defoliation and twig dieback throughout the canopy.
13. **Weak Attachments** - poorly formed branch connection at a crotch.
14. **Branch Cavities** - hollow areas in the limbs in the crown, usually due to the decay of wood.
15. **Over-extended Branch** - a large branch usually growing horizontally that may have excessive end weight and that exerts tremendous stress on its attachment. Can be corrected with reduction pruning.
16. **Epicormic Growth** - growth from adventitious buds along trunk and/or main limbs, rather than on twigs usually due to stress or poor pruning.
17. **Terrain** - refers to the general topography of the land where the tree is found.

RATING

1. **Heritage** - can vary in definition by agency but generally indicates a tree of significant size and age.
2. The **Health** of the trees was visually determined from a macroscopic inspection of signs and symptoms of disease. The following describes our rating system:
 - A - Outstanding** - A healthy and vigorous tree characteristic of its species and free of any significant visible signs of disease or insect damage;
 - B - Above Average** - A healthy and vigorous tree. However, there are minor visible signs of disease and insect damage;
 - C - Average** - Although healthy in overall appearance, there is a normal amount of disease and/or insect damage;
 - D - Below Average/Poor*** - This tree is characterized by exhibiting a greater degree of disease and/or insect damage or loss of structural integrity than normal and appears to be in a state of decline. This tree also exhibits extensive signs of dieback;
 - F - Dead*** - This tree exhibits no signs of life at the time of field evaluation.

*A tree rating of "D" and lower is in a low stage of vigor and naturally a meaningful level of recovery is doubtful. Removal should be considered if it is within the proposed project development.
3. The **Aesthetic/Conformity** quality of the trees was visually determined from an overall inspection of appearance. The following describes our system:
 - A. Outstanding** - The tree is visually symmetrical, having the ideal form and appearance for the species;
 - B. Above Average** - The tree, though may not be perfectly symmetrical, has a nearly ideal form for the species with very little dieback of foliage or twigs and branches;
 - C. Average** - The tree has some asymmetry for the species with some defects that can be corrected and/or has some dieback of foliage and twigs and branches;
 - D. Poor** - The tree has few positive characteristics that probably cannot be corrected and may detract from the beauty of the landscape.

GLOSSARY

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REMARKS (Some other terms that may be used)

1. **Bark Beetle Frass** – are wood fragments (dust) mixed in the insect's excrement produced by boring.
2. **Basal Growth** – is leaf growth generated from the base of the trunk.
3. **Cable/Brace** – provides support to relieve stress on a weak part of the tree (e.g. where two trunks form a "V" crotch.
4. **Cankers** – are rough swellings with depressed centers resulting in death of tissue that later cracks open and exposes the wood underneath in twigs, branches, and/or trunks. May be a sign of fungal damage.
5. **Chlorotic Leaves** – leaf veins remain normally green but the tissue between veins becomes yellow. Usually caused by nutrient deficiencies.
6. **Compartmentalization** – Physiological process in trees that creates the chemical and physical boundaries that act to limit the spread of disease and the decay organisms. Often seen where branches have been pruned properly.
7. **Crown** – parts of the tree above the trunk, including leaves, branches, and scaffold branches.
8. **Crown-clean pruning** – removal of dead, dying, diseased, rubbing, and structurally unsound branches, etc.
9. **Crown reduction pruning** – Removal of large branches and/or cutting back to large laterals to reduce the height or spread of the crown; sometimes referred to as “drop crotch” pruning or “natural pruning.”
10. **Exfoliating Bark** – the flaking off of bark from trunk, branches and/or twigs.
11. **Exposed Buttress Roots** – when soil is absent at the base of the tree exposing large roots at trunk flare.
12. **Fire Damage** – each tree may be rated on the amount of burn it has received.
13. **Heart Rot** – decay in the center of the tree (heartwood).
14. **Lion-tailing** – an improper pruning technique where internal foliage and branches are removed, leaving twigs and foliage concentrated at the branch ends.
15. **Mistletoe** – is a leafy evergreen, perennial parasite with dark green leathery leaves.
16. **Multiple stems/branches** – single location where several branches are attached often creating weak attachments.
17. **Powdery Mildew** – a white powdery fungus on leaves often found when new growth becomes wet for long periods of time; leaves may be distorted, stunted and drop prematurely.
18. **Reduction cuts** – cutting a branch back to a live lateral branch which will take over as the new end of that branch.
19. **Removal cuts** – a thinning cut back to the trunk or the parent stem (branch) that preserves the branch collar.
20. **Scaffold limb** – A primary structural branch of the crown.
21. **Stub cuts** – an improper pruning technique that leaves a stub that may lead to structural defects.
22. **Topping** – the improper pruning of large limbs, usually growing vertically, to reduce the height of a tree.
23. **Witches Broom** – is an abnormal growth cluster of twigs that may be caused by pruning, insects, mites, fungus, etc.

Appendix B

Photograph Log



Photo 1. Existing industrial development including buildings, impervious parking surfaces, and landscaping, facing southwest



Photo 2. Existing industrial development including buildings, impervious parking surfaces, and landscaping, facing northeast



Photo 3. Existing industrial development including buildings, impervious parking surfaces, and landscaping, facing southwest



Photo 4. *Artemisia californica* - *Lotus scoparius* association/California sagebrush - deer weed association within the northern portion of the site, facing southwest



Photo 5. *Encelia californica* association/California brittle bush association within the eastern portion of the site, facing north



Photo 6. Container trees and landscape trees along the eastern portion of the site, facing southeast



Photo 7. Disturbed habitat and container trees within the eastern portion of the site, facing east



Photo 8. Disturbed habitat within the eastern portion of the site, facing southwest



PP-01. Area 1. SP-01, facing southwest



PP-01. Area 1. SP-01, surface soil cracks



PP-01. Area 1. SP-01, soil pit



PP-01. Area 1. SP-01, soil sample



PP-02. Area 1, NA-HLM-01, facing north northwest



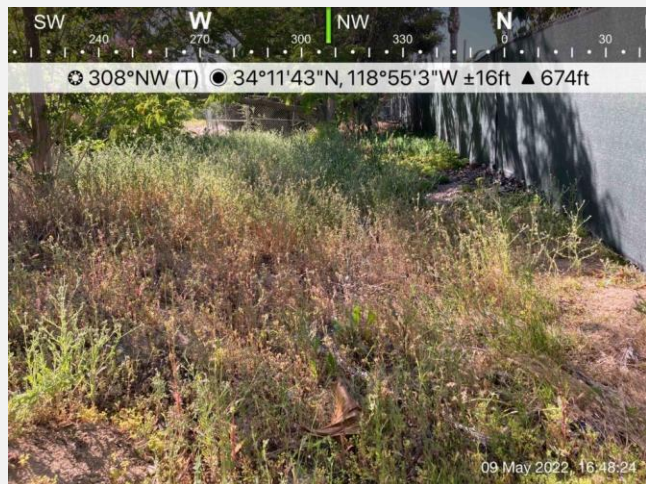
PP-03. Area 1, NA-HLM-01 in the background. Area 2 NA-HLM-02 in the foreground, facing southeast



PP-04. Area 2, NA-HLM-02, facing north northeast



PP-05. Area 2, NA-HLM-02, facing south



PP-06. Area 3, USW-HLM-01, facing north northwest



PP-07. Area 3, USW-HLM-01, facing north northwest



PP-08. Area 3, USW-HLM-01, facing north northwest



PP-09. Area 3, USW-HLM-01, facing north northwest



PP-10. Area 3, USW-HLM-02, facing north northwest



PP-11. Area 3, USW-HLM-02, facing north northwest



PP-11. Area 3, USW-HLM-02, facing north northwest



Photo 9. Area 2, SP-02, facing northeast



Photo 10. Area 3, SP-03, facing north northeast



Photo 11. Northern corner of the site, facing north

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Appendix C

Plant Species Not Expected to Occur

| Scientific Name | Common Name | Status (Federal/State/CRPR/Local) | Primary Habitat Associations/ Life Form/ Blooming Period/ Elevation Range (feet) | Potential to Occur |
|--|---------------------------|-----------------------------------|--|---|
| <i>Astragalus brauntonii</i> | Braunton's milk-vetch | FE/None/1B.1/ Locally Rare | Chaparral, Coastal scrub, Valley and foothill grassland/perennial herb/Jan–Aug/15–2,095 | Not expected to occur. No chaparral habitat present to support this species. There is limited coastal scrub habitat present within the northeastern and eastern portions of the site and scattered grasses within coastal scrub habitat. The nearest California Natural Diversity Database (CNDDB) observation is from 2013 and mapped approximately 3.1 miles east of the site (CDFW 2022). A focused special-status plant survey was conducted on May 9, 2022, during the species blooming period and the species would have been identified, if present. |
| <i>Calochortus catalinae</i> | Catalina mariposa lily | None/None/4.2/ None | Chaparral, Cismontane woodland, Coastal scrub, Valley and foothill grassland/perennial bulbiferous herb/(Feb)Mar–June/50–2,295 | Not expected to occur. No chaparral or cismontane woodland habitats present to support this species. There is limited coastal scrub habitat present within the northeastern and eastern portions of the site and scattered grasses within coastal scrub habitat. The nearest Calflora observation was documented in 2010 and mapped approximately 1.5 miles north northeast of the site (Calflora 2022). A focused special-status plant survey was conducted on May 9, 2022, during the species blooming period and the species would have been identified, if present. |
| <i>Calochortus clavatus</i> var. <i>clavatus</i> | club-haired mariposa lily | None/None/4.3/ Locally Common | Chaparral, Cismontane woodland, Coastal scrub, Valley and foothill grassland; Clay, Rocky, Serpentinite (usually)/perennial bulbiferous herb/(Mar)May–June/100–4,265 | Not expected to occur. No chaparral or cismontane woodland habitats present to support this species and the site lacks serpentinite soils. There is limited coastal scrub habitat present within the northeastern and eastern portions of the site and scattered grasses within coastal scrub habitat. The nearest Calflora observation was documented in 2003 and mapped approximately 2.3 miles north northeast of the site (Calflora 2022). A focused special-status plant survey was conducted on May 9, 2022, during the species blooming period and the species would have been identified, if present. |

| Scientific Name | Common Name | Status (Federal/State/CRPR/Local) | Primary Habitat Associations/ Life Form/ Blooming Period/ Elevation Range (feet) | Potential to Occur |
|---|------------------------------|---|--|---|
| <i>Calochortus plummerae</i> | Plummer's mariposa-lily | None/None/4.2/ Locally Important, Locally Scattered | Chaparral, Cismontane woodland, Coastal scrub, Lower montane coniferous forest, Valley and foothill grassland; Granitic, Rocky/perennial bulbiferous herb/May–July/330–5,575 | Not expected to occur. No chaparral, cismontane woodland, or lower montane coniferous forest habitats present to support this species. There is limited coastal scrub habitat present within the northeastern and eastern portions of the site and scattered grasses within coastal scrub habitat. The nearest Calflora observation was documented in 1992 and mapped approximately 5.6 miles northeast of the site (Calflora 2022). A focused special-status plant survey was conducted on May 9, 2022, during the species blooming period and the species would have been identified, if present. |
| <i>Centromadia parryi</i> ssp. <i>australis</i> | southern tarplant | None/None/1B.1/ Locally Important, Locally Rare | Marshes and swamps, Valley and foothill grassland, Vernal pools/annual herb/May–Nov/0–1,570 | Not expected to occur. No marsh, swamp, or vernal pool habitats present to support this species. There are limited scattered grasses within coastal scrub habitat within the northeastern and eastern portions of the site. The nearest CNDDB observation was documented in 2003 and mapped approximately 0.8 miles southwest of the site (CDFW 2022). A focused special-status plant survey was conducted on May 9, 2022, during the species blooming period and the species would have been identified, if present. |
| <i>Convolvulus simulans</i> | small-flowered morning-glory | None/None/4.2/ Locally Rare | Chaparral, Coastal scrub, Valley and foothill grassland; Clay, Seeps, Serpentine/annual herb/Mar–July/100–2,425 | Not expected to occur. No chaparral habitat present to support this species. There is limited coastal scrub habitat present within the northeastern and eastern portions of the site and scattered grasses within coastal scrub habitat. The nearest Calflora observation was documented in 2016 and mapped approximately 0.9 miles north of the site (Calflora 2022). A focused special-status plant survey was conducted on May 9, 2022, during the species blooming period and the species would have been identified, if present. |

| Scientific Name | Common Name | Status (Federal/State/CRPR/Local) | Primary Habitat Associations/ Life Form/ Blooming Period/ Elevation Range (feet) | Potential to Occur |
|--|-----------------------|---|--|--|
| <i>Deinandra minthornii</i> | Santa Susana tarplant | None/SR/1B.2/ Locally Rare | Chaparral, Coastal scrub; Rocky/perennial deciduous shrub/July–Nov/920–2,490 | Not expected to occur. No chaparral habitat present to support this species. There is limited coastal scrub habitat present within the northeastern and eastern portions of the site. The nearest CNDDDB observation was documented in 1989 and mapped approximately 4.2 miles southeast of the site (CDFW 2022). A focused special-status plant survey was conducted on May 9, 2022; although, the survey did not occur during the blooming period the species is a perennial deciduous shrub that would have been observed, if present. |
| <i>Delphinium parryi</i> ssp. <i>purpureum</i> | Mt. Pinos larkspur | None/None/4.3/ None | Chaparral, Mojavean desert scrub, Pinyon and juniper woodland/perennial herb/May–June/3,280–8,530 | Not expected to occur. The site is outside of the species' known elevation range. No chaparral, Mojavean desert scrub, or Pinyon and juniper woodland habitats present support this species. The nearest Calflora observation was documented in 1977 and mapped approximately 5.2 miles northeast of the site (Calflora 2022). A focused special-status plant survey was conducted on May 9, 2022, during the species blooming period and the species would have been identified, if present. |
| <i>Dudleya blochmaniae</i> ssp. <i>blochmaniae</i> | Blochman's dudleya | None/None/1B.1/ Locally Scattered | Chaparral, Coastal bluff scrub, Coastal scrub, Valley and foothill grassland; Clay (often), Rocky, Serpentinite/perennial herb/Apr–June/15–1,475 | Not expected to occur. No chaparral or coastal bluff scrub habitats present to support this species and the site lacks serpentinite soils. There is limited coastal scrub habitat present within the northeastern and eastern portions of the site and scattered grasses within coastal scrub habitat. The nearest CNDDDB observation is from 2016 and mapped approximately 1.1 miles west of the site (CDFW 2022). A focused special-status plant survey was conducted on May 9, 2022, during the species blooming period and the species would have been identified, if present. |
| <i>Dudleya cymosa</i> ssp. <i>marcescens</i> | marcescent dudleya | FT/SR/1B.2/ Locally Important, Locally Uncommon | Chaparral; Rocky, Volcanic/perennial herb/Apr–July/490–1,705 | Not expected to occur. No chaparral habitat present to support this species. The nearest CNDDDB observation is from 2010 and mapped approximately 3.6 miles south of the site (CDFW 2022). A focused special-status plant |

| Scientific Name | Common Name | Status (Federal/State/CRPR/Local) | Primary Habitat Associations/ Life Form/ Blooming Period/ Elevation Range (feet) | Potential to Occur |
|---------------------------|------------------|---|---|---|
| | | | | survey was conducted on May 9, 2022, during the species blooming period and the species would have been identified, if present. |
| <i>Dudleya parva</i> | Conejo dudleya | FT/None/1B.2/ Locally Important, Locally Rare | Coastal scrub, Valley and foothill grassland; Clay (sometimes), Gravelly (sometimes), Rocky (sometimes), Volcanic (sometimes)/perennial herb/May–June/195–1,475 | Not expected to occur. There is limited coastal scrub habitat present within the northeastern and eastern portions of the site and scattered grasses within coastal scrub habitat. The nearest CNDDDB observation is from 2010 and mapped approximately 0.8 miles west of the site (CDFW 2022). A focused special-status plant survey was conducted on May 9, 2022, during the species blooming period and the species would have been identified, if present. |
| <i>Dudleya verityi</i> | Verity's dudleya | FT/None/1B.1/ Locally Important, Locally Rare | Chaparral, Cismontane woodland, Coastal scrub; Rocky, Volcanic/perennial herb/May–June/195–395 | Not expected to occur. No chaparral or cismontane woodland habitats present to support this species. There is limited coastal scrub habitat present within the northeastern and eastern portions of the site. The nearest CNDDDB observation is from 2003 and mapped approximately 3.6 miles west of the site (CDFW 2022). A focused special-status plant survey was conducted on May 9, 2022, during the species blooming period and the species would have been identified, if present. |
| <i>Eriogonum crocatum</i> | conejo buckwheat | None/SR/1B.2/ Locally Important, Locally Rare | Chaparral, Coastal scrub, Valley and foothill grassland; Rocky/perennial herb/Apr–July/165–1,900 | Not expected to occur. No chaparral habitat present to support this species. There is limited coastal scrub habitat present within the northeastern and eastern portions of the site and scattered grasses within coastal scrub habitat. The nearest CNDDDB observation is from 2010 and mapped approximately 1.2 miles north of the site (CDFW 2022). A focused special-status plant survey was conducted on May 9, 2022, during the species blooming period and the species would have been identified, if present. |

| Scientific Name | Common Name | Status (Federal/State/CRPR/Local) | Primary Habitat Associations/ Life Form/ Blooming Period/ Elevation Range (feet) | Potential to Occur |
|---|----------------------------------|--|---|--|
| <i>Galium cliftonsmithii</i> | Santa Barbara bedstraw | None/None/4.3/ Locally Important, Locally Rare | Cismontane woodland/perennial herb/May–July/655–4,000 | Not expected to occur. No cismontane woodland habitat present to support this species. The nearest Calflora observation was documented in 1976 and mapped approximately 4.3 miles northwest of the site (Calflora 2022). A focused special-status plant survey was conducted on May 9, 2022, during the species blooming period and the species would have been identified, if present. |
| <i>Juglans californica</i> | Southern California black walnut | None/None/4.2/ None | Chaparral, Cismontane woodland, Coastal scrub, Riparian woodland/perennial deciduous tree/Mar–Aug/165–2,950 | Not expected to occur. No chaparral, cismontane woodland, or riparian woodland habitats present to support this species. There is limited coastal scrub habitat present within the northeastern and eastern portions of the site. The nearest Calflora observation was documented in 2001 and mapped approximately 1.6 miles northeast of the site (Calflora 2022). A focused special-status plant survey was conducted on May 9, 2022, during the species blooming period and the species would have been identified, if present. |
| <i>Lepechinia fragrans</i> | fragrant pitcher sage | None/None/4.2/ Locally Uncommon | Chaparral/perennial shrub/Mar–Oct/65–4,295 | Not expected to occur. No chaparral habitat present to support this species. The nearest Calflora observation was documented in 2008 and mapped approximately 3.6 miles south of the site (Calflora 2022). A focused special-status plant survey was conducted on May 9, 2022, during the species blooming period and the species would have been identified, if present. |
| <i>Lepidium virginicum</i> var. <i>robinsonii</i> | Robinson's pepper-grass | None/None/4.3/ None | Chaparral, Coastal scrub/annual herb/Jan–July/5–2,900 | Not expected to occur. No chaparral habitat present to support this species. There is limited coastal scrub habitat present within the northeastern and eastern portions of the site. The nearest Calflora observation is from 2017 and mapped approximately 3.5 miles west of the site (Calflora 2022). A focused special-status plant survey was conducted on May 9, 2022, during the |

| Scientific Name | Common Name | Status (Federal/State/CRPR/Local) | Primary Habitat Associations/ Life Form/ Blooming Period/ Elevation Range (feet) | Potential to Occur |
|---|---------------------------------|---|--|---|
| | | | | species blooming period and the species would have been identified, if present. |
| <i>Monardella hypoleuca</i> ssp. <i>hypoleuca</i> | white-veined monardella | None/None/1B.3/ Locally Uncommon | Chaparral, Cismontane woodland/perennial herb/(Apr)May–Aug (Sep–Dec)/165–5,000 | Not expected to occur. No chaparral or cismontane woodland habitats present to support this species. The nearest CNDDDB observation is from 2008 and mapped approximately 3.6 miles south of the site (CDFW 2022). A focused special-status plant survey was conducted on May 9, 2022, during the species blooming period and the species would have been identified, if present. |
| <i>Monardella sinuata</i> ssp. <i>gerryi</i> | Gerry's curly-leaved monardella | None/None/1B.1/ Locally Rare | Coastal scrub; Openings, Sandy/annual herb/Apr–June/490–805 | Not expected to occur. There is limited coastal scrub habitat present within the northeastern and eastern portions of the site. The nearest CNDDDB observation is from 2015 and mapped approximately 3.7 miles north of the site (CDFW 2022). A focused special-status plant survey was conducted on May 9, 2022, during the species blooming period and the species would have been identified, if present. |
| <i>Navarretia ojaiensis</i> | Ojai navarretia | None/None/1B.1/ Locally Scattered | Chaparral, Coastal scrub, Valley and foothill grassland/annual herb/May–July/900–2,030 | Not expected to occur. No chaparral habitat present to support this species. There is limited coastal scrub habitat present within the northeastern and eastern portions of the site and scattered grasses within coastal scrub habitat. The nearest CNDDDB observation is from 2014 and mapped approximately 1.0 miles north of the site (CDFW 2022). A focused special-status plant survey was conducted on May 9, 2022, during the species blooming period and the species would have been identified, if present. |
| <i>Orcuttia californica</i> | California Orcutt grass | FE/SE/1B.1/ Locally Important, Locally Rare | Vernal pools/annual herb/Apr–Aug/50–2,165 | Not expected to occur. No vernal pool habitat present to support this species. The nearest CNDDDB observation was documented in the general vicinity of Thousand Oaks; however, the date seen is unknown (CDFW 2022). A focused special-status plant survey was conducted on |

| Scientific Name | Common Name | Status (Federal/State/CRPR/Local) | Primary Habitat Associations/ Life Form/ Blooming Period/ Elevation Range (feet) | Potential to Occur |
|---------------------------|-----------------------|-----------------------------------|--|--|
| | | | | May 9, 2022, during the species blooming period and the species would have been identified, if present. |
| <i>Pentachaeta lyonii</i> | Lyon's pentachaeta | FE/SE/1B.1/ Locally Rare | Chaparral, Coastal scrub, Valley and foothill grassland/annual herb/(Feb)Mar–Aug/100–2,260 | Not expected to occur. No chaparral habitat present to support this species. There is limited coastal scrub habitat present within the northeastern and eastern portions of the site and scattered grasses within coastal scrub habitat. The nearest CNDDDB observation is from 2016 and mapped approximately 0.9 miles north of the site (CDFW 2022). A focused special-status plant survey was conducted on May 9, 2022, during the species blooming period and the species would have been identified, if present. |
| <i>Piperia michaelii</i> | Michael's rein orchid | None/None/4.2/ Locally Rare | Chaparral, Cismontane woodland, Closed-cone coniferous forest, Coastal bluff scrub, Coastal scrub, Lower montane coniferous forest/perennial herb/Apr–Aug/10–3,000 | Not expected to occur. No chaparral, cismontane woodland, closed-cone coniferous forest, coastal bluff scrub, or lower montane coniferous forest habitats present to support this species. There is limited coastal scrub habitat present within the northeastern and eastern portions of the site. The nearest Calflora observation is from 2008 and mapped approximately 3.5 miles south of the site (Calflora 2022). A focused special-status plant survey was conducted on May 9, 2022, during the species blooming period and the species would have been identified, if present. |
| <i>Quercus dumosa</i> | Nuttall's scrub oak | None/None/1B.1/ Locally Rare | Chaparral, Closed-cone coniferous forest, Coastal scrub/perennial evergreen shrub/Feb–Apr (May–Aug)/50–1,310 | Not expected to occur. No chaparral or closed-cone coniferous forest habitats present to support this species. There is limited coastal scrub habitat present within the northeastern and eastern portions of the site. The nearest CNDDDB observation is from 2016 and mapped approximately 4.0 miles southwest of the site (CDFW 2022). A focused special-status plant survey was conducted on May 9, 2022, during the species blooming period and the species would have been identified, if present. |

| Scientific Name | Common Name | Status (Federal/State/CRPR/Local) | Primary Habitat Associations/ Life Form/ Blooming Period/ Elevation Range (feet) | Potential to Occur |
|---------------------------|-------------------|---|--|---|
| <i>Senecio aphanactis</i> | chaparral ragwort | None/None/2B.2/ Locally Important, Locally Rare | Chaparral, Cismontane woodland, Coastal scrub/annual herb/Jan–Apr (May)/50–2,620 | Not expected to occur. No chaparral or cismontane woodland habitats present to support this species. There is limited coastal scrub habitat present within the northeastern and eastern portions of the site. The nearest CNDDDB observation is from 2009 and mapped approximately 1.8 miles northeast of the site (CDFW 2022). |

Notes:

Status Legend:

FE: Federally listed as endangered

FT: Federally listed as threatened

FC: Federal Candidate for listing

DL: Delisted

SE: State listed as endangered

ST: State listed as threatened

SC: State Candidate for listing

SR: State Rare

CRPR 1A: Plants presumed extirpated in California and either rare or extinct elsewhere

CRPR 1B: Plants rare, threatened, or endangered in California and elsewhere

CRPR 2A: Plants presumed extirpated in California but common elsewhere

CRPR 2B: Plants rare, threatened, or endangered in California but more common elsewhere

CRPR 3: Review List: Plants about which more information is needed

CRPR 4: Watch List: Plants of limited distribution

.1 Seriously threatened in California (over 80% of occurrences threatened / high degree and immediacy of threat)

.2 Moderately 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)

CBR: Considered but Rejected

Locally Important: Included on the Ventura County Planning Division 2018 Locally Important Plant List (Ventura County Planning Division 2018)

Locally Rare: Included on the Checklist of Ventura County Rare Plants (Magney 2020)

Locally Uncommon: Included on the Checklist of Ventura County Rare Plants (Magney 2020)

Locally Scattered: Included on the Checklist of Ventura County Rare Plants (Magney 2020)

Appendix D

Plant Species Compendium

Dicots

ANACARDIACEAE—SUMAC OR CASHEW FAMILY

Malosma laurina—laurel sumac

Rhus integrifolia—lemonade berry

* *Schinus molle*—Peruvian peppertree

* *Schinus terebinthifolius*—Brazilian peppertree

APIACEAE—CARROT FAMILY

* *Foeniculum vulgare*—fennel

APOCYNACEAE—DOGBANE FAMILY

Asclepias fascicularis—Mexican whorled milkweed

* *Vinca major*—bigleaf periwinkle

ARALIACEAE—GINSENG FAMILY

* *Hedera helix*—English ivy

ASTERACEAE—SUNFLOWER FAMILY

Artemisia californica—California sagebrush

Baccharis pilularis—coyote brush

Baccharis salicifolia—mulefat

* *Carduus pycnocephalus* ssp. *pycnocephalus*—Italian plumeless thistle

* *Centaurea melitensis*—Maltese star-thistle

* *Dimorphotheca fruticosa*—shrubby daisybush

Encelia californica—California brittle bush

* *Erigeron bonariensis*—asthmaweed

* *Erigeron karvinskianus*—Latin American fleabane

* *Erigeron sumatrensis*—asthmaweed

Eriophyllum confertiflorum var. *confertiflorum*—golden-yarrow

* *Helminthotheca echioides*—bristly oxtongue

Heterotheca grandiflora—telegraphweed

* *Lactuca serriola*—prickly lettuce

Malacothrix saxatilis var. *commutata*—cliff desertdandelion

Pseudognaphalium biolettii—two-color rabbit-tobacco

Pseudognaphalium californicum—ladies' tobacco

* *Pseudognaphalium luteoalbum*—Jersey cudweed

Pseudognaphalium microcephalum—Wright's cudweed

Rafinesquia californica—California plumeseed

* *Sonchus asper*—spiny sowthistle

- * *Sonchus oleraceus*—common sowthistle
- * *Tragopogon porrifolius*—salsify

BORAGINACEAE—BORAGE FAMILY

- * *Echium candicans*—pride of Madeira

BRASSICACEAE—MUSTARD FAMILY

- * *Hirschfeldia incana*—shortpod mustard
- * *Lepidium didymum*—lesser swinecress
- * *Rosmarinus officinalis*—rosemary
- * *Sisymbrium irio*—London rocket
- * *Sisymbrium orientale*—Indian hedgemustard

CAPRIFOLIACEAE—HONEYSUCKLE FAMILY

- * *Lonicera japonica*—Japanese honeysuckle

CHENOPODIACEAE—GOOSEFOOT FAMILY

- Atriplex lentiformis*—quailbush
- * *Salsola tragus*—prickly Russian thistle

CISTACEAE—ROCK-ROSE FAMILY

- * *Cistus incanus*—hairy rockrose
- * *Cistus salviifolius*—salvia cistus

CONVOLVULACEAE—MORNING-GLORY FAMILY

Calystegia macrostegia ssp. *intermedia*—island false bindweed

CRASSULACEAE—STONECROP FAMILY

Dudleya lanceolata—lanceleaf liveforever

CUCURBITACEAE—GOURD FAMILY

- * *Cupaniopsis anacardioides*—carrotwood

EUPHORBIACEAE—SPURGE FAMILY

- * *Euphorbia maculata*—spotted sandmat
- * *Euphorbia peplus*—petty spurge

FABACEAE—LEGUME FAMILY

- * *Acacia baileyana*—cootamundra wattle
- Acmispon glaber*—deer weed
- * *Albizia julibrissin*—silktree
- * *Lotus corniculatus*—bird's-foot trefoil
- * *Medicago lupulina*—black medick

- * *Medicago polymorpha*—burclover
- * *Melilotus indicus*—annual yellow sweetclover
- * *Vicia sativa*—garden vetch

FAGACEAE—OAK FAMILY

- Quercus agrifolia*—coast live oak
- * *Quercus ilex*—holly oak
- * *Quercus suber*—no common name

GERANIACEAE—GERANIUM FAMILY

- * *Erodium cicutarium*—redstem stork's bill

LAMIACEAE—MINT FAMILY

- * *Marrubium vulgare*—horehound

LAURACEAE—LAUREL FAMILY

- * *Cinnamomum camphora*—camphortree

LINACEAE—FLAX FAMILY

- * *Liquidambar styraciflua*—sweetgum

LYTHRACEAE—LOOSESTRIFE FAMILY

- * *Lagerstroemia indica*—crape myrtle
- * *Punica granatum*—pomegranate

MAGNOLIACEAE—MAGNOLIA FAMILY

- * *Magnolia grandiflora*—southern magnolia

MORACEAE—MULBERRY FAMILY

- * *Ficus carica*—edible fig

MYRSINACEAE—MYRSINE FAMILY

- * *Lysimachia arvensis*—scarlet pimpernel

MYRTACEAE—MYRTLE FAMILY

- * *Callistemon citrinus*—lemon bottlebrush
- * *Eucalyptus camaldulensis*—river redgum
- * *Eucalyptus polyanthemos*—redbox

OLEACEAE—OLIVE FAMILY

- Fraxinus velutina*—velvet ash
- * *Ligustrum japonicum*—Japanese privet

ONAGRACEAE—EVENING PRIMROSE FAMILY

Epilobium canum ssp. *canum*—hummingbird trumpet

Epilobium ciliatum—fringed willowherb

* *Oenothera speciosa*—pinkladies

Oenothera suffrutescens—scarlet beeblossom

OXALIDACEAE—OXALIS FAMILY

* *Oxalis corniculata*—creeping woodsorrel

PITTOSPORACEAE—PITTOSPORUM FAMILY

* *Pittosporum tobira*—Japanese cheesewood

PLANTAGINACEAE—PLANTAIN FAMILY

* *Kickxia elatine*—sharp-leaf cancerwort

* *Plantago lanceolata*—narrowleaf plantain

PLATANACEAE—PLANE TREE, SYCAMORE FAMILY

Platanus racemosa—California sycamore

POLYGONACEAE—BUCKWHEAT FAMILY

* *Rumex crispus*—curly dock

Rumex salicifolius—willow dock

ROSACEAE—ROSE FAMILY

* *Cotoneaster horizontalis*—wall or herringbone cotoneaster

* *Cotoneaster pannosus*—silverleaf cotoneaster

Heteromeles arbutifolia—toyon

* *Pyrus calleryana*—flowering pear

* *Pyrus communis*—common pear

SALICACEAE—WILLOW FAMILY

Populus fremontii—Fremont cottonwood

Salix laevigata—red willow

Salix lasiolepis—arroyo willow

SAPINDACEAE—SOAPBERRY FAMILY

* *Acer* sp.—maple

* *Dodonaea viscosa*—Florida hopbush

* *Koelreuteria* sp.—flame tree

SOLANACEAE—NIGHTSHADE FAMILY

* *Nicotiana glauca*—tree tobacco

ULMACEAE—ELM FAMILY

- * *Ulmus* sp.—elm

URTICACEAE—NETTLE FAMILY

Urtica urens—dwarf nettle

VERBENACEAE—VERVAIN FAMILY

- * *Lantana montevidensis*—trailing shrubverbena

Gymnosperms and Gnetophytes

PINACEAE—PINE FAMILY

- * *Pinus canariensis*—Canary Island pine
- * *Pinus halepensis*—aleppo pine

Monocots

AGAVACEAE—AGAVE FAMILY

- * *Agave americana*—American century plant
- Chlorogalum pomeridianum* var. *pomeridianum*—wavyleaf soap plant

ARECACEAE—PALM FAMILY

- * *Washingtonia robusta*—Washington fan palm

ASPARAGACEAE—ASPARAGUS FAMILY

- * *Asparagus aethiopicus*—Sprenger's asparagus fern

CYPERACEAE—SEDGE FAMILY

Cyperus eragrostis—tall flatsedge

POACEAE—GRASS FAMILY

- * *Avena barbata*—slender oat
- * *Avena fatua*—wild oat
- * *Bromus diandrus*—ripgut brome
- * *Bromus madritensis*—compact brome
- * *Bromus rubens*—red brome
- * *Cortaderia jubata*—purple pampas grass
- * *Cortaderia selloana*—Uruguayan pampas grass
- * *Cynodon dactylon*—Bermudagrass
- * *Festuca myuros*—rat-tail fescue
- Melica imperfecta*—smallflower melicgrass
- * *Pennisetum setaceum*—fountain grass

Stipa lepida—foothill needlegrass

* *Stipa miliacea* var. *miliacea*—smilgrass

* *Stipa tenuissima*—no common name

* signifies introduced (non-native) species

Appendix E

Wildlife Species Not Expected to Occur

| Scientific Name | Common Name | Status (Federal/State/Local) | Habitat | Potential to Occur |
|---|--------------------------------|------------------------------|---|--|
| Birds | | | | |
| <i>Agelaius tricolor</i> (nesting colony) | tricolored blackbird | None/SSC, ST/None | Nests in freshwater, emergent wetland with cattails or tules, but also in Himalayan blackberry; forages in grasslands, woodland, and agriculture | Not expected to occur. No suitable open freshwater marsh, marsh and swamp, swamp, or wetland habitats present. The nearest CNDDDB observation is from 1995 and mapped approximately 4.4 miles southeast of the site (CDFW 2022). |
| <i>Aquila chrysaetos</i> (nesting & wintering) | golden eagle | None/FP/None | Nests and winters in hilly, open/semi-open areas, including shrublands, grasslands, pastures, riparian areas, mountainous canyon land, open desert rimrock terrain; nests in large trees and on cliffs in open areas and forages in open habitats | Not expected to occur. No suitable hilly, open/semi-open areas, mountainous canyon land, open desert rimrock terrain, or cliff habitats present. Additionally, the coastal scrub habitats present are disturbed, developed, and isolated. The nearest CNDDDB observation is from 1989 and mapped approximately 4.4 miles south of the site in the Santa Monica Mountains (CDFW 2022). |
| <i>Empidonax traillii extimus</i> (nesting) | southwestern willow flycatcher | FE/SE/None | Nests in dense riparian habitats along streams, reservoirs, or wetlands; uses variety of riparian and shrubland habitats during migration | Not expected to occur. No riparian habitat on or near the site to support this species. The nearest CNDDDB observation is from 2008 and mapped approximately 12.8 miles northwest of the site along the Santa Clara River (CDFW 2022). |
| <i>Polioptila californica californica</i> | coastal California gnatcatcher | FT/SSC/None | Nests and forages in various sage scrub communities, often dominated by California sagebrush and buckwheat; generally avoids nesting in areas with a slope of greater than 40%; majority of nesting at less than 1,000 feet above mean sea level | Not expected to occur. There is limited, disturbed coastal scrub habitat present within the northeastern and eastern portions of the site, which is surrounded by industrial uses including business parks, associated parking lots, and residential. During the May 2022 site surveys evidence of maintenance (mowing) was observed within portions of the scrub habitat. The nearest CNDDDB observation is from 2019 and mapped approximately 0.6 miles west of the site in the Conejo Canyons Open Space (CDFW 2022). |

| Scientific Name | Common Name | Status (Federal/State/Local) | Habitat | Potential to Occur |
|--|--|------------------------------|---|--|
| <i>Riparia riparia</i> (nesting) | bank swallow | None/ST/None | Nests in riparian, lacustrine, and coastal areas with vertical banks, bluffs, and cliffs with sandy soils; open country and water during migration | Not expected to occur. No suitable riparian, lacustrine, or coastal areas with vertical banks, bluffs, or cliffs with sandy soils present. The nearest CNDDDB observation is from 1964 and mapped approximately 3.7 miles southeast of the site south of Highway 101 at Lake Sherwood (Potrero Lake; CDFW 2022). |
| <i>Vireo bellii pusillus</i> (nesting) | least Bell's vireo | FE/SE/None | Nests and forages in low, dense riparian thickets along water or along dry parts of intermittent streams; forages in riparian and adjacent shrubland late in nesting season | Not expected to occur. No suitable stream or riparian habitat in the vicinity of water or dry river bottom present. Additionally, the limited native habitat present within the northeastern and eastern portions of the site is surrounded by industrial uses including business parks, associated parking lots, and residential. The nearest CNDDDB observation is from 2008 and mapped approximately 2.5 miles north northwest of the site along Arroyo Santa Rosa (CDFW 2022). |
| Fishes | | | | |
| <i>Gila orcuttii</i> | arroyo chub | None/SSC/None | Warm, fluctuating streams with slow-moving or backwater sections of warm to cool streams at depths >40 centimeters (16 inches); substrates of sand or mud | Not expected to occur. No aquatic habitat present. |
| <i>Oncorhynchus mykiss irideus</i> pop. 10 | southern steelhead - southern California DPS | FE/SCE/None | Clean, clear, cool, well-oxygenated streams; needs relatively deep pools in migration and gravelly substrate to spawn | Not expected to occur. No aquatic habitat present. |
| Invertebrates | | | | |
| <i>Branchinecta lynchi</i> | vernal pool fairy shrimp | FT/None/None | Vernal pools, seasonally ponded areas within vernal swales, and ephemeral freshwater habitats | Not expected to occur. No vernal pools, seasonally ponded areas within vernal swales, or ephemeral freshwater habitats present to support this species. The nearest observation is mapped approximately 28 miles northeast of the site (CDFW 2022). |

| Scientific Name | Common Name | Status (Federal/State/Local) | Habitat | Potential to Occur |
|----------------------------------|--------------------------|------------------------------|--|--|
| <i>Danaus plexippus</i> pop. 1 | monarch | FC/None/None | Wind-protected tree groves with nectar sources and nearby water sources | Not expected to occur. Mature eucalyptus trees are present at the site; however, the trees are scattered throughout parking lot landscape and do not form a wind-protected tree grove. The nearest observation is from 1999 mapped approximately 9.7 miles southwest of the site at the mouth of La Jolla Canyon, Point Mugu State Park (CDFW 2022, Xerces 2022). |
| <i>Streptocephalus woottoni</i> | Riverside fairy shrimp | FE/None/None | Vernal pools, non-vegetated ephemeral pools | Not expected to occur. No vernal pools or non-vegetated ephemeral pools present to support this species. The nearest observation is from 2011 and mapped approximately 6.0 miles northeast of the site at the Tierra Rejada Vernal Pool Preserve (CDFW 2022). |
| Mammals | | | | |
| <i>Neotoma lepida intermedia</i> | San Diego desert woodrat | None/SSC/None | Coastal scrub, desert scrub, chaparral, cacti, rocky areas. San Diego desert woodrat middens are made from twigs, sticks, cactus parts, or rocks, preferably in rock crevices, bases of cactus, or in the lower branches of trees (Animal Diversity 2022). | Not expected to occur. No rocky cliff habitat or rock crevices with moderate to dense canopies present. Woodrat middens were observed within the eastern portion of the site; however, the middens were comprised of sticks, bark, and plant material, typical of common big-eared woodrat (<i>Neotoma macrotis</i> ; Carraway and Verts 1991) not directly next to the base of coast live oak and pepper trees (<i>Schinus</i> sp.). The nearest observation is from 2016 and mapped approximately 3.2 miles south southwest of the site (CDFW 2022). |
| <i>Puma concolor</i> | cougar | None/SC/None | Scrubs, chaparral, riparian, woodland, and forest; rests in rocky areas and on cliffs and ledges that provide cover; most abundant in riparian areas and brushy stages of most habitats throughout California, except deserts | Not expected to occur. No chaparral, woodland, or forest habitats or rocky areas, cliffs, or ledges to support this species. The site includes limited native habitat within an overall low canopy height within the northeastern and eastern portions of the site surrounded by industrial uses including business parks, associated parking lots, and residential. Due to the lack of habitat with brushy vegetation, high |

| Scientific Name | Common Name | Status (Federal/State/Local) | Habitat | Potential to Occur |
|-------------------------------|------------------------------------|------------------------------|---|---|
| | | | | level of urbanization of the site and surrounding areas and lack of access to the site through wildlife linkages, cougars are not expected to occur. Additionally, the main prey base for cougars, mule deer, likely do not occupy the site due to the highly urbanized surroundings and lack of access to the site through wildlife linkages. |
| Reptiles | | | | |
| <i>Anniella stebbinsi</i> | southern California legless lizard | None/SSC/None | Coastal dunes, stabilized dunes, beaches, dry washes, valley-foothill, chaparral, and scrubs; pine, oak, and riparian woodlands; associated with sparse vegetation and moist sandy or loose, loamy soils | Not expected to occur. No coastal dune, stabilized dune, beach, dry wash, chaparral, or woodland habitats present to support this species. The site includes limited coastal scrub habitat present within the northeastern and eastern portions of the site. During the May 2022 site surveys evidence of maintenance (mowing) was observed within portions of the scrub habitat. The nearest observation is from 2015 and mapped approximately 2.0 miles east southeast of the site (CDFW 2022). |
| <i>Emys marmorata</i> | western pond turtle | None/SSC/None | Slow-moving permanent or intermittent streams, ponds, small lakes, and reservoirs with emergent basking sites; adjacent uplands used for nesting and during winter | Not expected to occur. No permanent or intermittent streams, ponds, small lakes, or reservoirs with emerging basking sites to support this species. The nearest observation is from 2000 and mapped approximately 0.9 miles north of the site in the Arroyo Conejo and Conejo Creek (CDFW 2022). |
| <i>Phrynosoma blainvillii</i> | Blainville's horned lizard | None/SSC/None | Open areas of sandy soil in valleys, foothills, and semi-arid mountains including coastal scrub, chaparral, valley-foothill hardwood, conifer, riparian, pine-cypress, juniper, and annual grassland habitats | Not expected to occur. No suitable sandy soils with valley, foothills, or semi-arid mountains with coastal scrub, chaparral, valley-foothill hardwood, conifer, riparian, pine-cypress, juniper, or annual grassland habitats present to support this species. The nearest observation is from 2007 and mapped approximately 3.6 miles north of the site at the southern slope of the Las Posas Hills (CDFW 2022). |

| Scientific Name | Common Name | Status (Federal/State/Local) | Habitat | Potential to Occur |
|----------------------------|-------------------------|------------------------------|---|---|
| <i>Thamnophis hammondi</i> | two-striped gartersnake | None/SSC/None | Streams, creeks, pools, streams with rocky beds, ponds, lakes, vernal pools | Not expected to occur. No suitable stream, creek, pool, streams with rock beds, pond, lake, or vernal pool habitats present to support this species. The nearest observation is from 1996 and mapped approximately 3.6 miles southwest of the site, southeast of Conejo Mountain (CDFW 2022). |

Notes:

FE: Federally listed as endangered

FT: Federally listed as threatened

FC: Federal candidate species (former Category 1 candidates)

BCC: U.S. Fish and Wildlife Service Bird of Conservation Concern

SSC: California Species of Special Concern

FP: California Fully Protected Species

WL: California Watch List Species

SE: State listed as endangered

ST: State listed as threatened

SC: State candidate for listing as threatened or endangered

SCE: State candidate for listing as endangered

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Appendix F

Wildlife Species Compendium

Birds

COLUMBIDAE—PIGEONS AND DOVES

Zenaida macroura—mourning dove

CORVIDAE—CROWS & JAYS

Corvus brachyrhynchos—American crow

FRINGILLIDAE—FRINGILLINE AND CARDUELINE FINCHES AND ALLIES

Haemorhous mexicanus—house finch

Spinus psaltria—lesser goldfinch

MIMIDAE—MOCKINGBIRDS AND THRASHERS

Mimus polyglottos—northern mockingbird

PASSERELLIDAE—NEW WORLD SPARROWS

Junco hyemalis—dark-eyed junco

Pipilo maculatus—spotted towhee

PASSERIDAE—OLD WORLD SPARROWS

* *Passer domesticus*—house sparrow

TROCHILIDAE—HUMMINGBIRDS

Calypte anna—Anna's hummingbird

TROGLODYTIDAE—WRENS

Thryomanes bewickii—Bewick's wren

Mammals

LEPORIDAE—HARES AND RABBITS

Sylvilagus bachmani—brush rabbit

Reptiles

PHRYNOSOMATIDAE—IGUANID LIZARDS

Sceloporus occidentalis—western fence lizard

* signifies introduced (non-native) species

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Appendix G

Wetland Determination Data Forms

WETLAND DETERMINATION DATA FORM – Arid West Region

Project/Site: 1100 Rancho Conejo City/County: Thousand Oaks/Ventura Sampling Date: May 9, 2022
 Applicant/Owner: _____ State: CA Sampling Point: SP-01
 Investigator(s): Heather Moine Section, Township, Range: 6, 01N, 19W
 Landform (hillslope, terrace, etc.): _____ Local relief (concave, convex, none): Concave Slope (%): 1
 Subregion (LRR): C: Mediterranean CA Lat: 34.196203°N Long: 118.919038°W Datum: WGS 84
 Soil Map Unit Name: Gilroy loam, 15 to 50 percent slopes, very rocky NWI classification: NA
 Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No _____ (If no, explain in Remarks.)
 Are Vegetation N, Soil N, or Hydrology N significantly disturbed? Are "Normal Circumstances" present? Yes X No _____
 Are Vegetation N, Soil N, or Hydrology N naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

| | |
|--|---|
| Hydrophytic Vegetation Present? Yes _____ No <u>X</u> | Is the Sampled Area within a Wetland? Yes _____ No <u>X</u> |
| Hydric Soil Present? Yes _____ No <u>X</u> | |
| Wetland Hydrology Present? Yes <u>X</u> No _____ | |
| Remarks: <u>Review of historic aerials indicate previous disturbance of this area including vegetation removal, soil piles, and soil disturbance</u> | |

VEGETATION – Use scientific names of plants.

| Tree Stratum (Plot size: <u>Ø</u>) | Absolute % Cover | Dominant Species? | Indicator Status | Dominance Test worksheet: Number of Dominant Species That Are OBL, FACW, or FAC: <u>2</u> (A) Total Number of Dominant Species Across All Strata: <u>5</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>40</u> (A/B) |
|--|------------------|-------------------|------------------|---|
| 1. _____ | | | | |
| 2. _____ | | | | |
| 3. _____ | | | | |
| 4. _____ | | | | |
| Sapling/Shrub Stratum (Plot size: <u>100 ft²</u>) <u>Ø</u> = Total Cover | | | | Prevalence Index worksheet: Total % Cover of: _____ Multiply by: _____ OBL species <u>0</u> x 1 = <u>0</u> FACW species <u>0</u> x 2 = <u>0</u> FAC species <u>82</u> x 3 = <u>246</u> FACU species <u>2</u> x 4 = <u>8</u> UPL species <u>56</u> x 5 = <u>280</u> Column Totals: <u>140</u> (A) <u>534</u> (B) Prevalence Index = B/A = <u>3.81</u> |
| 1. <u>Baccharis salicifolia</u> | <u>70</u> | <u>Y</u> | <u>FAC</u> | |
| 2. <u>Baccharis pilularis</u> | <u>20</u> | <u>Y</u> | <u>NL</u> | |
| 3. <u>Nicotiana glauca</u> | <u>2</u> | <u>N</u> | <u>FAC</u> | |
| 4. _____ | | | | |
| Herb Stratum (Plot size: <u>25 ft²</u>) <u>92</u> = Total Cover | | | | Hydrophytic Vegetation Indicators: <u>N</u> Dominance Test is >50% <u>N</u> Prevalence Index is ≤3.0 ¹ <u>N</u> Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <u>N</u> Problematic Hydrophytic Vegetation ¹ (Explain) |
| 1. <u>Lotus corniculatus</u> | <u>7</u> | <u>Y</u> | <u>FAC</u> | |
| 2. <u>Erigeron bonariensis</u> | <u>2</u> | <u>N</u> | <u>FACU</u> | |
| 3. <u>Erodium cicutarium</u> | <u>5</u> | <u>N</u> | <u>NL</u> | |
| 4. <u>Kickxia elatine</u> | <u>5</u> | <u>N</u> | <u>UPL</u> | |
| 5. <u>Centaurea melitensis</u> | <u>5</u> | <u>N</u> | <u>NL</u> | ¹ Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic. |
| 6. <u>Euphorbia peplur</u> | <u>6</u> | <u>Y</u> | <u>NL</u> | |
| 7. <u>Hirschfeldia incana</u> | <u>15</u> | <u>Y</u> | <u>NL</u> | |
| 8. <u>Lysimachia arvensis</u> | <u>3</u> | <u>N</u> | <u>FAC</u> | |
| Woody Vine Stratum (Plot size: <u>Ø</u>) <u>47</u> = Total Cover <u>23.5</u> | | | | |
| 1. _____ | | | | Hydrophytic Vegetation Present? Yes _____ No <u>X</u> |
| 2. _____ | | | | |
| % Bare Ground in Herb Stratum <u>53</u> % Cover of Biotic Crust <u>Ø</u> | | | | |

Remarks:

SOIL

Sampling Point: SP-01

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)

| Depth (inches) | Matrix | | Redox Features | | | | Texture | Remarks |
|-------------------|---------------|-----|----------------|---|-------------------|------------------|------------|---------|
| | Color (moist) | % | Color (moist) | % | Type ¹ | Loc ² | | |
| 0-10 | 10YR 4/3 | 100 | — | — | — | — | Sandy loam | |
| | | | | | | | | |
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¹Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered or Coated Sand Grains. ²Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

- ☐ Histosol (A1)
☐ Histic Epipedon (A2)
☐ Black Histic (A3)
☐ Hydrogen Sulfide (A4)
☐ Stratified Layers (A5) (LRR C)
☐ 1 cm Muck (A9) (LRR D)
☐ Depleted Below Dark Surface (A11)
☐ Thick Dark Surface (A12)
☐ Sandy Mucky Mineral (S1)
☐ Sandy Gleyed Matrix (S4)

- ☐ Sandy Redox (S5)
☐ Stripped Matrix (S6)
☐ Loamy Mucky Mineral (F1)
☐ Loamy Gleyed Matrix (F2)
☐ Depleted Matrix (F3)
☐ Redox Dark Surface (F6)
☐ Depleted Dark Surface (F7)
☐ Redox Depressions (F8)
☐ Vernal Pools (F9)

Indicators for Problematic Hydric Soils³:

- ☐ 1 cm Muck (A9) (LRR C)
☐ 2 cm Muck (A10) (LRR B)
☐ Reduced Vertic (F18)
☐ Red Parent Material (TF2)
☐ Other (Explain in Remarks)

³Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive Layer (if present):

 Type: _____
 Depth (inches): _____
Hydric Soil Present? Yes _____ No X

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required; check all that apply)

- ☐ Surface Water (A1)
☐ High Water Table (A2)
☐ Saturation (A3)
☐ Water Marks (B1) (Nonriverine)
☐ Sediment Deposits (B2) (Nonriverine)
☒ Drift Deposits (B3) (Nonriverine)
☐ Surface Soil Cracks (B6)
☐ Inundation Visible on Aerial Imagery (B7)
☐ Water-Stained Leaves (B9)

- ☐ Salt Crust (B11)
☐ Biotic Crust (B12)
☐ Aquatic Invertebrates (B13)
☐ Hydrogen Sulfide Odor (C1)
☐ Oxidized Rhizospheres along Living Roots (C3)
☐ Presence of Reduced Iron (C4)
☐ Recent Iron Reduction in Tilled Soils (C6)
☐ Thin Muck Surface (C7)
☐ Other (Explain in Remarks)

Secondary Indicators (2 or more required)

- ☐ Water Marks (B1) (Riverine)
☐ Sediment Deposits (B2) (Riverine)
☐ Drift Deposits (B3) (Riverine)
☐ Drainage Patterns (B10)
☐ Dry-Season Water Table (C2)
☐ Crayfish Burrows (C8)
☐ Saturation Visible on Aerial Imagery (C9)
☐ Shallow Aquitard (D3)
☐ FAC-Neutral Test (D5)

Field Observations:

 Surface Water Present? Yes _____ No X Depth (inches): NA
 Water Table Present? Yes _____ No X Depth (inches): NA
 Saturation Present? Yes _____ No X Depth (inches): NA
 (includes capillary fringe)
Wetland Hydrology Present? Yes X No _____

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

but downslope/lower topography
 Culvert at toe of slope adjacent to SP-01 area. The area of SP-01 includes minor depressions but generally area is sloping to the NE corner of the property

Associated data sheet NA-HLM-01

WETLAND DETERMINATION DATA FORM – Arid West Region

Project/Site: 1100 Rancho Conejo City/County: Thousand Oaks/Ventura Sampling Date: May 9, 2022
 Applicant/Owner: _____ State: CA Sampling Point: SP-02
 Investigator(s): Heather Moine Section, Township, Range: 6, 01N, 19W
 Landform (hillslope, terrace, etc.): _____ Local relief (concave, convex, none): concave Slope (%): 1
 Subregion (LRR): C: Mediterranean CA Lat: 34.196486°N Long: 118.919251°W Datum: WGS84
 Soil Map Unit Name: Gilroy loam, 15 to 50 percent slopes, very rocky NWI classification: NA
 Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No _____ (If no, explain in Remarks.)
 Are Vegetation Y, Soil N, or Hydrology N significantly disturbed? Are "Normal Circumstances" present? Yes X No _____
 Are Vegetation N, Soil N, or Hydrology N naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

| | | | |
|---|-----------------------|--|-----------------------|
| Hydrophytic Vegetation Present? | Yes _____ No <u>X</u> | Is the Sampled Area within a Wetland? | Yes _____ No <u>X</u> |
| Hydric Soil Present? | Yes _____ No _____ | | |
| Wetland Hydrology Present? | Yes _____ No <u>X</u> | | |
| Remarks: <u>Some evidence of mowing</u> | | | |

VEGETATION – Use scientific names of plants.

| Tree Stratum (Plot size: <u>Ø</u>) | Absolute % Cover | Dominant Species? | Indicator Status | Dominance Test worksheet: Number of Dominant Species That Are OBL, FACW, or FAC: <u>2</u> (A) Total Number of Dominant Species Across All Strata: <u>4</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>50</u> (A/B) |
|---|----------------------------------|-------------------|------------------|--|
| 1. _____ | | | | |
| 2. _____ | | | | |
| 3. _____ | | | | |
| 4. _____ | | | | |
| = Total Cover | | | | Prevalence Index worksheet: Total % Cover of: _____ Multiply by: OBL species <u>0</u> x 1 = <u>0</u> FACW species <u>0</u> x 2 = <u>0</u> FAC species <u>72</u> x 3 = <u>216</u> FACU species <u>2</u> x 4 = <u>8</u> UPL species <u>27</u> x 5 = <u>135</u> Column Totals: <u>701</u> (A) <u>359</u> (B) Prevalence Index = B/A = <u>3.55</u> |
| Sapling/Shrub Stratum (Plot size: <u>100 ft²</u>) | | | | |
| 1. <u>Quercus agrifolia</u> | <u>2</u> | <u>Y</u> | <u>NL</u> | |
| 2. <u>Baccharis salicifolia</u> | <u>5</u> | <u>Y</u> | <u>FAC</u> | |
| 3. _____ | | | | |
| = Total Cover | | | | |
| Herb Stratum (Plot size: <u>25 ft²</u>) | | | | Hydrophytic Vegetation Indicators: <u>N</u> Dominance Test is >50% <u>N</u> Prevalence Index is ≤3.0 ¹ <u>N</u> Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <u>N</u> Problematic Hydrophytic Vegetation ¹ (Explain) ¹ Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic. |
| 1. <u>Lotus corniculatus</u> | <u>65</u> | <u>Y</u> | <u>FAC</u> | |
| 2. <u>Hirschfeldia incana</u> | <u>20</u> | <u>Y</u> | <u>NL</u> | |
| 3. <u>Erodium cicutarium</u> | <u>3</u> | <u>N</u> | <u>NL</u> | |
| 4. <u>Lactuca serriola</u> | <u>2</u> | <u>N</u> | <u>FACU</u> | |
| 5. <u>Helminthotheca echioides</u> | <u>1</u> | <u>N</u> | <u>FAC</u> | |
| 6. <u>Centaurea melitensis</u> | <u>1</u> | <u>N</u> | <u>NL</u> | |
| 7. <u>Carduus pycnocephalus</u> | <u>1</u> | <u>N</u> | <u>NL</u> | |
| 8. <u>Lysimachia arvensis</u> | <u>1</u> | <u>N</u> | <u>FAC</u> | |
| = Total Cover <u>94</u> | | | | |
| Woody Vine Stratum (Plot size: <u>Ø</u>) | | | | Hydrophytic Vegetation Present? Yes _____ No <u>X</u> |
| 1. _____ | | | | |
| 2. _____ | | | | |
| = Total Cover | | | | |
| % Bare Ground in Herb Stratum <u>2</u> | % Cover of Biotic Crust <u>Ø</u> | | | |
| Remarks: | | | | |

Sampling Point: SP-02

[illegible]²Location: PL=Pore Lining, M=Matrix.

Indicators for Problematic Hydric Soils³:

- ☐ 1 cm Muck (A9) (**LRR C**)
☐ 2 cm Muck (A10) (**LRR B**)
☐ Reduced Vertic (F18)
☐ Red Parent Material (TF2)
☐ Other (Explain in Remarks)

³Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Type: _____
Depth (inches): _____

Hydric Soil Present? Yes _____ No _____

Since no hydrophytic veg and no hydrology, no soil pit excavated

Wetland Hydrology Indicators:

Secondary Indicators (2 or more required)

- | | | |
|--|--|--|
| <input type="checkbox"/> Surface Water (A1) | <input type="checkbox"/> Salt Crust (B11) | <input type="checkbox"/> Water Marks (B1) (Riverine) |
| <input type="checkbox"/> High Water Table (A2) | <input type="checkbox"/> Biotic Crust (B12) | <input type="checkbox"/> Sediment Deposits (B2) (Riverine) |
| <input type="checkbox"/> Saturation (A3) | <input type="checkbox"/> Aquatic Invertebrates (B13) | <input type="checkbox"/> Drift Deposits (B3) (Riverine) |
| <input type="checkbox"/> Water Marks (B1) (Nonriverine) | <input type="checkbox"/> Hydrogen Sulfide Odor (C1) | <input checked="" type="checkbox"/> Drainage Patterns (B10) |
| <input type="checkbox"/> Sediment Deposits (B2) (Nonriverine) | <input type="checkbox"/> Oxidized Rhizospheres along Living Roots (C3) | <input type="checkbox"/> Dry-Season Water Table (C2) |
| <input type="checkbox"/> Drift Deposits (B3) (Nonriverine) | <input type="checkbox"/> Presence of Reduced Iron (C4) | <input type="checkbox"/> Crayfish Burrows (C8) |
| <input type="checkbox"/> Surface Soil Cracks (B6) | <input type="checkbox"/> Recent Iron Reduction in Tilled Soils (C6) | <input type="checkbox"/> Saturation Visible on Aerial Imagery (C9) |
| <input type="checkbox"/> Inundation Visible on Aerial Imagery (B7) | <input type="checkbox"/> Thin Muck Surface (C7) | <input type="checkbox"/> Shallow Aquitard (D3) |
| <input type="checkbox"/> Water-Stained Leaves (B9) | <input type="checkbox"/> Other (Explain in Remarks) | <input type="checkbox"/> FAC-Neutral Test (D5) |

Surface Water Present? Yes _____ No X Depth (inches):

Water Table Present? Yes _____ No X Depth (inches):

Saturation Present? Yes _____ No X Depth (inches):
(includes capillary fringe)

Wetland Hydrology Present? Yes ☐ No ☒

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM – Arid West Region

Project/Site: 1100 Rancho Conejo City/County: Thousand Oaks/Ventura Sampling Date: May 9, 2022
 Applicant/Owner: _____ State: CA Sampling Point: SP-03
 Investigator(s): Heather Moine Section, Township, Range: 6, 01N, 19W
 Landform (hillslope, terrace, etc.): _____ Local relief (concave, convex, none): concave Slope (%): 1
 Subregion (LRR): C: Mediterranean CA Lat: 34.196311°N Long: 118.918790°W Datum: WGS 84
 Soil Map Unit Name: Rincon silty clay loam, 2 to 9 percent slopes, MLRA 19 NWI classification: _____
 Are climatic / hydrologic conditions on the site typical for this time of year? Yes X No _____ (If no, explain in Remarks.)
 Are Vegetation N, Soil N, or Hydrology N significantly disturbed? N Are "Normal Circumstances" present? Yes X No _____
 Are Vegetation N, Soil N, or Hydrology N naturally problematic? N (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

| | | |
|---------------------------------|-----------------------|--|
| Hydrophytic Vegetation Present? | Yes _____ No <u>X</u> | Is the Sampled Area within a Wetland? Yes _____ No <u>X</u> |
| Hydric Soil Present? | Yes _____ No <u>X</u> | |
| Wetland Hydrology Present? | Yes _____ No <u>X</u> | |
| Remarks: | | |

VEGETATION – Use scientific names of plants.

| Tree Stratum (Plot size: _____) | Absolute % Cover | Dominant Species? | Indicator Status | Dominance Test worksheet: Number of Dominant Species That Are OBL, FACW, or FAC: <u>0</u> (A) Total Number of Dominant Species Across All Strata: <u>0</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>—</u> (A/B) | | | | | | | | | | | | | | | | |
|---|------------------|-------------------|------------------|---|-------------------|--------------|----------------------|----------------|-----------------------|-----------------|-----------------------|-----------------|-----------------------|-----------------|-----------------------|------------------|------------------------------|----------------|--------------------------------------|--|
| 1. _____ | | | | | | | | | | | | | | | | | | | | |
| 2. _____ | | | | | | | | | | | | | | | | | | | | |
| 3. _____ | | | | | | | | | | | | | | | | | | | | |
| 4. _____ | | | | | | | | | | | | | | | | | | | | |
| <u>0</u> = Total Cover | | | | Prevalence Index worksheet: <table border="0"> <tr> <td>Total % Cover of:</td> <td>Multiply by:</td> </tr> <tr> <td>OBL species <u>0</u></td> <td>x 1 = <u>0</u></td> </tr> <tr> <td>FACW species <u>5</u></td> <td>x 2 = <u>10</u></td> </tr> <tr> <td>FAC species <u>10</u></td> <td>x 3 = <u>30</u></td> </tr> <tr> <td>FACU species <u>5</u></td> <td>x 4 = <u>20</u></td> </tr> <tr> <td>UPL species <u>75</u></td> <td>x 5 = <u>375</u></td> </tr> <tr> <td>Column Totals: <u>95</u> (A)</td> <td><u>435</u> (B)</td> </tr> <tr> <td colspan="2">Prevalence Index = B/A = <u>4.58</u></td> </tr> </table> | Total % Cover of: | Multiply by: | OBL species <u>0</u> | x 1 = <u>0</u> | FACW species <u>5</u> | x 2 = <u>10</u> | FAC species <u>10</u> | x 3 = <u>30</u> | FACU species <u>5</u> | x 4 = <u>20</u> | UPL species <u>75</u> | x 5 = <u>375</u> | Column Totals: <u>95</u> (A) | <u>435</u> (B) | Prevalence Index = B/A = <u>4.58</u> | |
| Total % Cover of: | Multiply by: | | | | | | | | | | | | | | | | | | | |
| OBL species <u>0</u> | x 1 = <u>0</u> | | | | | | | | | | | | | | | | | | | |
| FACW species <u>5</u> | x 2 = <u>10</u> | | | | | | | | | | | | | | | | | | | |
| FAC species <u>10</u> | x 3 = <u>30</u> | | | | | | | | | | | | | | | | | | | |
| FACU species <u>5</u> | x 4 = <u>20</u> | | | | | | | | | | | | | | | | | | | |
| UPL species <u>75</u> | x 5 = <u>375</u> | | | | | | | | | | | | | | | | | | | |
| Column Totals: <u>95</u> (A) | <u>435</u> (B) | | | | | | | | | | | | | | | | | | | |
| Prevalence Index = B/A = <u>4.58</u> | | | | | | | | | | | | | | | | | | | | |
| <u>0</u> = Total Cover | | | | | | | | | | | | | | | | | | | | |
| Sapling/Shrub Stratum (Plot size: _____) 1. _____ 2. _____ 3. _____ 4. _____ 5. _____ | | | | | | | | | | | | | | | | | | | | |
| <u>0</u> = Total Cover | | | | | | | | | | | | | | | | | | | | |
| Herb Stratum (Plot size: <u>25ft²</u>) 1. <u>Rumex crispus</u> <u>5</u> <u>N</u> <u>FAC</u> 2. <u>Lysimachia arvensis</u> <u>5</u> <u>N</u> <u>FAC</u> 3. <u>Cyperus eragrostis</u> <u>5</u> <u>N</u> <u>FACW</u> 4. <u>Kickxia elatine</u> <u>35</u> <u>Y</u> <u>UPL</u> 5. <u>Euphorbia peplais</u> <u>15</u> <u>N</u> <u>NL</u> 6. <u>Carduus pycnocephalus</u> <u>25</u> <u>Y</u> <u>NL</u> 7. <u>Lactuca serriola</u> <u>5</u> <u>N</u> <u>FACU</u> 8. <u>Sonchus oleraceus</u> <u>21</u> <u>N</u> <u>UPL</u> <u>95</u> = Total Cover <u>47.5</u> | | | | | | | | | | | | | | | | | | | | |
| Woody Vine Stratum (Plot size: _____) 1. _____ 2. _____ <u>0</u> = Total Cover | | | | | | | | | | | | | | | | | | | | |
| % Bare Ground in Herb Stratum <u>5</u> % Cover of Biotic Crust <u>0</u> | | | | | | | | | | | | | | | | | | | | |
| Remarks: | | | | | | | | | | | | | | | | | | | | |

Sampling Point: SP-03

[illegible]

Indicators for Problematic Hydric Soils³:

- ³Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Hydric Soil Present? Yes _____ No _____

no soil pit excavated since no hydrology
and no hydrophobic veg present

Secondary Indicators (2 or more required)

- Wetland Hydrology Present? Yes _____ No X

Remarks:

Appendix H

Ordinary High Water Mark Data Sheets

OHWM DATA SHEET

Project: 1100 Rancho Conejo Date: May 9, 2022

Feature ID: NA-HLM-01 ← not mapped for data sheet
Transect ID: Transect - NA-HLM-01

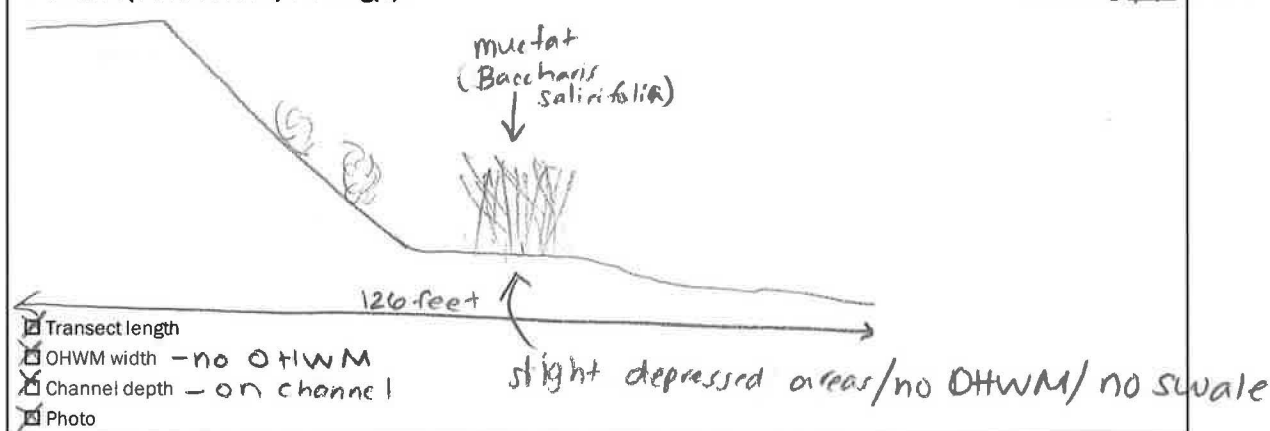
Investigator(s): Heather Morine

Site Location: 1100 Rancho Conejo - City of Thousand Oaks
Ventura County CA

Feature Type: ☐ Ephemeral ☐ Intermittent ☐ Perennial ☒ Other

Transect (cross-section) drawing(s):

View Facing: NNW



OHWM Indicators (at OHWM; primary indicators indicated with *)

| | |
|---|--|
| <input type="checkbox"/> Natural line impressed on the bank | <input type="checkbox"/> Sediment sorting |
| <input type="checkbox"/> Shelving | <input type="checkbox"/> Leaf litter disturbed or washed away |
| <input type="checkbox"/> Changes in the character of soil (texture)* | <input type="checkbox"/> Scour |
| <input type="checkbox"/> Destruction of terrestrial vegetation | <input type="checkbox"/> Deposition |
| <input type="checkbox"/> Presence of litter and debris | <input type="checkbox"/> Bed and banks |
| <input type="checkbox"/> Wracking | <input type="checkbox"/> Water staining |
| <input type="checkbox"/> Vegetation matted down, bent, or absent | <input type="checkbox"/> Change in plant community and/or cover* |
| <input type="checkbox"/> Break in Slope at OHWM*: <input type="checkbox"/> Sharp (>60°) <input type="checkbox"/> Moderate (30-60°) <input type="checkbox"/> Gentle (<30°) | |

Soil Texture -sandy loam

| | Clay/Silt | Sand | Gravel | Cobbles | Boulders |
|------------|-----------|------|--------|---------|----------|
| Above OHWM | | | | | |
| Below OHWM | | | | | |

| Total Vegetation Cover | 0% | 70% | 15% | 15% |
|------------------------|----------|-----------|----------|----------|
| | Tree (%) | Shrub (%) | Herb (%) | Bare (%) |
| Above OHWM | | | | |
| Below OHWM | | | | |

Veg Stage: ☐ Early (herbs & seedlings) ☐ Mid (herbs, shrubs, saplings) ☐ Late (herbs, shrubs, mature trees)

| Upland Species: | Bank Species: | Emergent Species: |
|-----------------|---------------|-------------------|
| | | |

Veg Species
BACJAL
BACPIL
NICGLA
LOTGOR
ERIBON
EROCIC
KICELA
CENMEL
EUPPEP
HIRINC
LYSARV

OHWM DATA SHEET

Condition/Disturbances/Anthropogenic Influences (e.g., erosion, grazing, culverts, etc.):

Review of historic aerials indicate previous disturbance of this area including vegetation removal, soil pile, and soil disturbance

Hydrology

| | | |
|---|---------------|---------------|
| <input type="checkbox"/> Flowing water | Avg. depth: — | Min. depth: — |
| <input type="checkbox"/> Standing water | Temp: — | Max. depth: — |
| <input type="checkbox"/> Saturated | | |
| <input checked="" type="checkbox"/> Dry | | |

Checklist of resources (if available):

| | | |
|--|---|--|
| <input checked="" type="checkbox"/> Aerial photography | <input checked="" type="checkbox"/> Vegetation maps | <input checked="" type="checkbox"/> GPS unit |
| <input type="checkbox"/> Remotely-sensed images | <input checked="" type="checkbox"/> Soil maps | <input type="checkbox"/> Stream gage data |
| <input type="checkbox"/> Topographic maps | <input type="checkbox"/> Rainfall/precipitation data | <input type="checkbox"/> Other studies: |
| <input type="checkbox"/> Geologic maps | <input type="checkbox"/> Existing delineation(s) for site | |

Other drawings (aerial view), notes:

Area is dominated by mulefat (*Baccharis salicifolia*); however, the area lacks an ordinary highwater mark and swale. Instead the area is at the toe of slope and the area slopes gradually towards the north and northeast to the northeast corner of the property.

Other forms related to this feature: ☒ Yes ☐ No

- ☐ Terrace, fringe, or floodplain wetland (wetland datasheet)
☐ Low flow channel or other representative section (OHWM datasheet)

SP-01

OHWM DATA SHEET

Project: 1100 Rancho Conejo Date: May 9, 2022

Feature ID: NA-HLM-02

Investigator(s): Heather Moine

Transect ID: Transect-NA-HLM-02

Site Location: 1100 Rancho Conejo - City of Thousand Oaks
Ventura county

Feature Type: ☐ Ephemeral ☐ Intermittent ☐ Perennial ☒ Other

Transect (cross-section) drawing(s):

View Facing: NNE

- ☒ Transect length 29ft
☒ OHWM width NA
☒ Channel depth NA
☒ Photo

OHWM Indicators (at OHWM; primary indicators indicated with *)

NO OHWM indicators

- | | |
|---|--|
| <input type="checkbox"/> Natural line impressed on the bank | <input type="checkbox"/> Sediment sorting |
| <input type="checkbox"/> Shelving | <input type="checkbox"/> Leaf litter disturbed or washed away |
| <input type="checkbox"/> Changes in the character of soil (texture)* | <input type="checkbox"/> Scour |
| <input type="checkbox"/> Destruction of terrestrial vegetation | <input type="checkbox"/> Deposition |
| <input type="checkbox"/> Presence of litter and debris | <input type="checkbox"/> Bed and banks |
| <input type="checkbox"/> Wracking | <input type="checkbox"/> Water staining |
| <input type="checkbox"/> Vegetation matted down, bent, or absent | <input type="checkbox"/> Change in plant community and/or cover* |
| <input type="checkbox"/> Break in Slope at OHWM*: <input type="checkbox"/> Sharp (>60°) <input type="checkbox"/> Moderate (30-60°) <input type="checkbox"/> Gentle (<30°) | |

Soil Texture sandy loam

| | Clay/Silt | Sand | Gravel | Cobbles | Boulders |
|------------|-----------|------|--------|---------|----------|
| Above OHWM | | | | | |
| Below OHWM | | | | | |

Total Vegetation Cover

2%

5%

9%

10%

| | Tree (%) | Shrub (%) | Herb (%) | Bare (%) |
|------------|----------|-----------|----------|----------|
| Above OHWM | | | | |
| Below OHWM | | | | |

Veg Stage: ☐ Early (herbs & seedlings) ☐ Mid (herbs, shrubs, saplings) ☐ Late (herbs, shrubs, mature trees)

| Upland Species: | Bank Species: | Emergent Species: |
|-----------------|---------------|-------------------|
| | | |

Veg species
QUEAGR
BACSA
LOTOR
HIRIN
EROC
CENMEL
HELECH
KICELA
LACSER
SONASP
LYSARV

OHWM DATA SHEET

Condition/Disturbances/Anthropogenic Influences (e.g., erosion, grazing, culverts, etc.):

- Culvert adjacent at toe of slope, with topo decreasing to NNE
- area mowed

Hydrology

| | | |
|---|---------------|---------------|
| <input type="checkbox"/> Flowing water | Avg. depth: — | Min. depth: — |
| <input type="checkbox"/> Standing water | Temp: — | Max. depth: — |
| <input type="checkbox"/> Saturated | | |
| <input checked="" type="checkbox"/> Dry | | |

Checklist of resources (if available):

| | | |
|--|---|--|
| <input checked="" type="checkbox"/> Aerial photography | <input checked="" type="checkbox"/> Vegetation maps | <input checked="" type="checkbox"/> GPS unit |
| <input type="checkbox"/> Remotely-sensed images | <input checked="" type="checkbox"/> Soil maps | <input type="checkbox"/> Stream gage data |
| <input type="checkbox"/> Topographic maps | <input type="checkbox"/> Rainfall/precipitation data | <input type="checkbox"/> Other studies: |
| <input type="checkbox"/> Geologic maps | <input type="checkbox"/> Existing delineation(s) for site | |

Other drawings (aerial view), notes:

- slight topo relief but no defined OHWM or swale
- aerial - more green w/in slight topo relief area but same veg as adjacent
- mapped lowest topo relief but no OHWM or swale
- decomposing gravel sandbags in NE corner of property

Other forms related to this feature: ☐ Yes ☒ No

☐ Terrace, fringe, or floodplain wetland (wetland datasheet)

☐ Low flow channel or other representative section (OHWM datasheet)

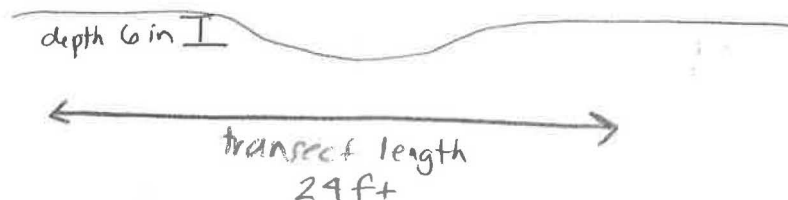
SP-02

OHWM DATA SHEET

Project: 1100 Rancho Conejo Date: May 9, 2022Feature ID: USW-HLM-01Investigator(s): Heather MoineTransect ID: transect-USW-HLM-01Site Location: 1100 Rancho Conejo City - Thousand Oaks
County - VenturaFeature Type: ☒ Ephemeral ☐ Intermittent ☐ Perennial ☐ Other

Transect (cross-section) drawing(s):

upland swale

View Facing: NNW☒ Transect length 24ft☒ OHWM width NA☒ Channel depth 6 in☒ Photo

swale width = 1 foot

OHWM Indicators (at OHWM; primary indicators indicated with *)

No indicators observed

- | | |
|---|--|
| <input type="checkbox"/> Natural line impressed on the bank | <input type="checkbox"/> Sediment sorting |
| <input type="checkbox"/> Shelving | <input type="checkbox"/> Leaf litter disturbed or washed away |
| <input type="checkbox"/> Changes in the character of soil (texture)* | <input type="checkbox"/> Scour |
| <input type="checkbox"/> Destruction of terrestrial vegetation | <input type="checkbox"/> Deposition |
| <input type="checkbox"/> Presence of litter and debris | <input type="checkbox"/> Bed and banks |
| <input type="checkbox"/> Wracking | <input type="checkbox"/> Water staining |
| <input type="checkbox"/> Vegetation matted down, bent, or absent | <input type="checkbox"/> Change in plant community and/or cover* |
| <input type="checkbox"/> Break in Slope at OHWM*: <input type="checkbox"/> Sharp (>60°) <input type="checkbox"/> Moderate (30-60°) <input type="checkbox"/> Gentle (<30°) | |

Soil Texture - sandy loam

| | Clay/Silt | Sand | Gravel | Cobbles | Boulders |
|------------|-----------|------|--------|---------|----------|
| Above OHWM | | | | | |
| Below OHWM | | | | | |

Total Vegetation Cover

| | Tree (%) | Shrub (%) | Herb (%) | Bare (%) |
|------------|----------|-----------|----------|----------|
| Above OHWM | | | | |
| Below OHWM | | | | |

30

5

15

60

Veg. spec. Veg Stage: ☐ Early (herbs & seedlings) ☐ Mid (herbs, shrubs, saplings) ☐ Late (herbs, shrubs, mature trees)

EUPPEP
PIN CAN
SONOLE
LACSER
HETARB

Upland Species:

Bank Species:

Emergent Species:

OHWM DATA SHEET

Condition/Disturbances/Anthropogenic Influences (e.g., erosion, grazing, culverts, etc.):

landscape trees in boxes adjacent
to upland swale

Hydrology

| | | |
|---|-------------------|-------------------|
| <input type="checkbox"/> Flowing water | Avg. depth: _____ | Min. depth: _____ |
| <input type="checkbox"/> Standing water | Temp: _____ | Max. depth: _____ |
| <input type="checkbox"/> Saturated | | |
| <input checked="" type="checkbox"/> Dry | | |

Checklist of resources (if available):

| | | |
|--|---|--|
| <input checked="" type="checkbox"/> Aerial photography | <input checked="" type="checkbox"/> Vegetation maps | <input checked="" type="checkbox"/> GPS unit |
| <input type="checkbox"/> Remotely-sensed images | <input checked="" type="checkbox"/> Soil maps | <input type="checkbox"/> Stream gage data |
| <input type="checkbox"/> Topographic maps | <input type="checkbox"/> Rainfall/precipitation data | <input type="checkbox"/> Other studies: |
| <input type="checkbox"/> Geologic maps | <input type="checkbox"/> Existing delineation(s) for site | |

Other drawings (aerial view), notes:

- area within upland swale and adjacent dominated by plant litter/debris including pine needles
- upland swale
- topo relief towards NNW
- between USW-HLM-01 and USW-HLM-02 open flat area with no swale

Other forms related to this feature: ☐ Yes ☒ No

☐ Terrace, fringe, or floodplain wetland (wetland datasheet)

☐ Low flow channel or other representative section (OHWM datasheet)

OHWM DATA SHEET

Project: 1100 Rancho Conejo Date: May 9, 2022

Feature ID: USW-HLM-02

Investigator(s): Heather Moine

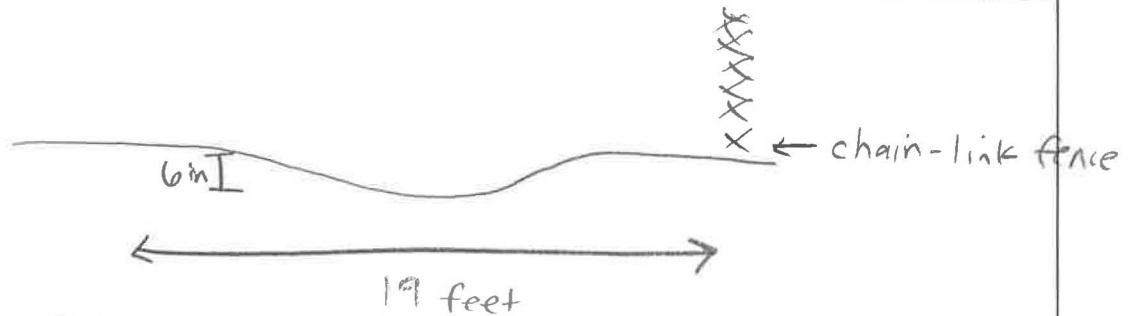
Transect ID: Transect-USW-HLM-02

Site Location: 1100 Rancho Conejo City - Thousand Oaks
County - Ventura

Feature Type: ☒ Ephemeral ☐ Intermittent ☐ Perennial ☐ Other

Transect (cross-section) drawing(s):

View Facing: NNW



- ☒ Transect length 19 feet
☒ OHWM width NA
☒ Channel depth 6 in
☒ Photo

swale width = 1 foot

OHWM Indicators (at OHWM; primary indicators indicated with *) No indicators observed

- | | |
|---|--|
| <input type="checkbox"/> Natural line impressed on the bank | <input type="checkbox"/> Sediment sorting |
| <input type="checkbox"/> Shelving | <input type="checkbox"/> Leaf litter disturbed or washed away |
| <input type="checkbox"/> Changes in the character of soil (texture)* | <input type="checkbox"/> Scour |
| <input type="checkbox"/> Destruction of terrestrial vegetation | <input type="checkbox"/> Deposition |
| <input type="checkbox"/> Presence of litter and debris | <input type="checkbox"/> Bed and banks |
| <input type="checkbox"/> Wracking | <input type="checkbox"/> Water staining |
| <input type="checkbox"/> Vegetation matted down, bent, or absent | <input type="checkbox"/> Change in plant community and/or cover* |
| <input type="checkbox"/> Break in Slope at OHWM*: <input type="checkbox"/> Sharp (>60°) <input type="checkbox"/> Moderate (30-60°) <input type="checkbox"/> Gentle (<30°) | |

Soil Texture - sandy clay

| | Clay/Silt | Sand | Gravel | Cobbles | Boulders |
|------------|-----------|------|--------|---------|----------|
| Above OHWM | | | | | |
| Below OHWM | | | | | |

| Total Vegetation Cover | 80% | 0% | 40% | 20 |
|------------------------|----------|-----------|----------|----------|
| | Tree (%) | Shrub (%) | Herb (%) | Bare (%) |
| Above OHWM | | | | |
| Below OHWM | | | | |

Veg. Species Veg Stage: ☐ Early (herbs & seedlings) ☐ Mid (herbs, shrubs, saplings) ☐ Late (herbs, shrubs, mature trees)

CARPYC
RUMCRI
CYPERA
KICELA
EUPPEP
BROMAB
LACSER

| Upland Species: | Bank Species: | Emergent Species: |
|-----------------|---------------|-------------------|
| | | |

OHWM DATA SHEET

Condition/Disturbances/Anthropogenic Influences (e.g., erosion, grazing, culverts, etc.):

◦ landscape trees in boxes adjacent
to upland swale

Hydrology

| | | |
|---|---------------|---------------|
| <input type="checkbox"/> Flowing water | Avg. depth: — | Min. depth: — |
| <input type="checkbox"/> Standing water | Temp: — | Max. depth: — |
| <input type="checkbox"/> Saturated | | |
| <input checked="" type="checkbox"/> Dry | | |

Checklist of resources (if available):

| | | |
|--|---|--|
| <input checked="" type="checkbox"/> Aerial photography | <input type="checkbox"/> Vegetation maps | <input checked="" type="checkbox"/> GPS unit |
| <input type="checkbox"/> Remotely-sensed images | <input checked="" type="checkbox"/> Soil maps | <input type="checkbox"/> Stream gage data |
| <input type="checkbox"/> Topographic maps | <input type="checkbox"/> Rainfall/precipitation data | <input type="checkbox"/> Other studies: |
| <input type="checkbox"/> Geologic maps | <input type="checkbox"/> Existing delineation(s) for site | |

Other drawings (aerial view), notes:

◦ upland swale

◦ topo relief towards NNW

◦ between USW-HLM-01 and
USW-HLM-02 open flat area with no swale

◦ at lowest topographic area in
NE corner of site/property, decomposing
gravel sand bags

Other forms related to this feature: ☒ Yes ☐ No

☐ Terrace, fringe, or floodplain wetland (wetland datasheet)

☐ Low flow channel or other representative section (OHWM datasheet)

SP-03