
4. ENVIRONMENTAL IMPACT ANALYSIS

3. BIOLOGICAL RESOURCES

4.3.1 INTRODUCTION

The following section addresses the Proposed Project's potential to result in significant impacts upon biological resources, including vegetation and wildlife resources. The analysis presented below is based on the Biological Resources Assessment, Jurisdictional Delineation and Impact Assessment, Dockweiler Road Extension Project, Santa Clarita, California, prepared by Impact Sciences, Inc., dated April 2015 ("Biological Assessment"). The Biological Assessment is provided in Appendix D of this Draft EIR.

4.3.2 ENVIRONMENTAL SETTING

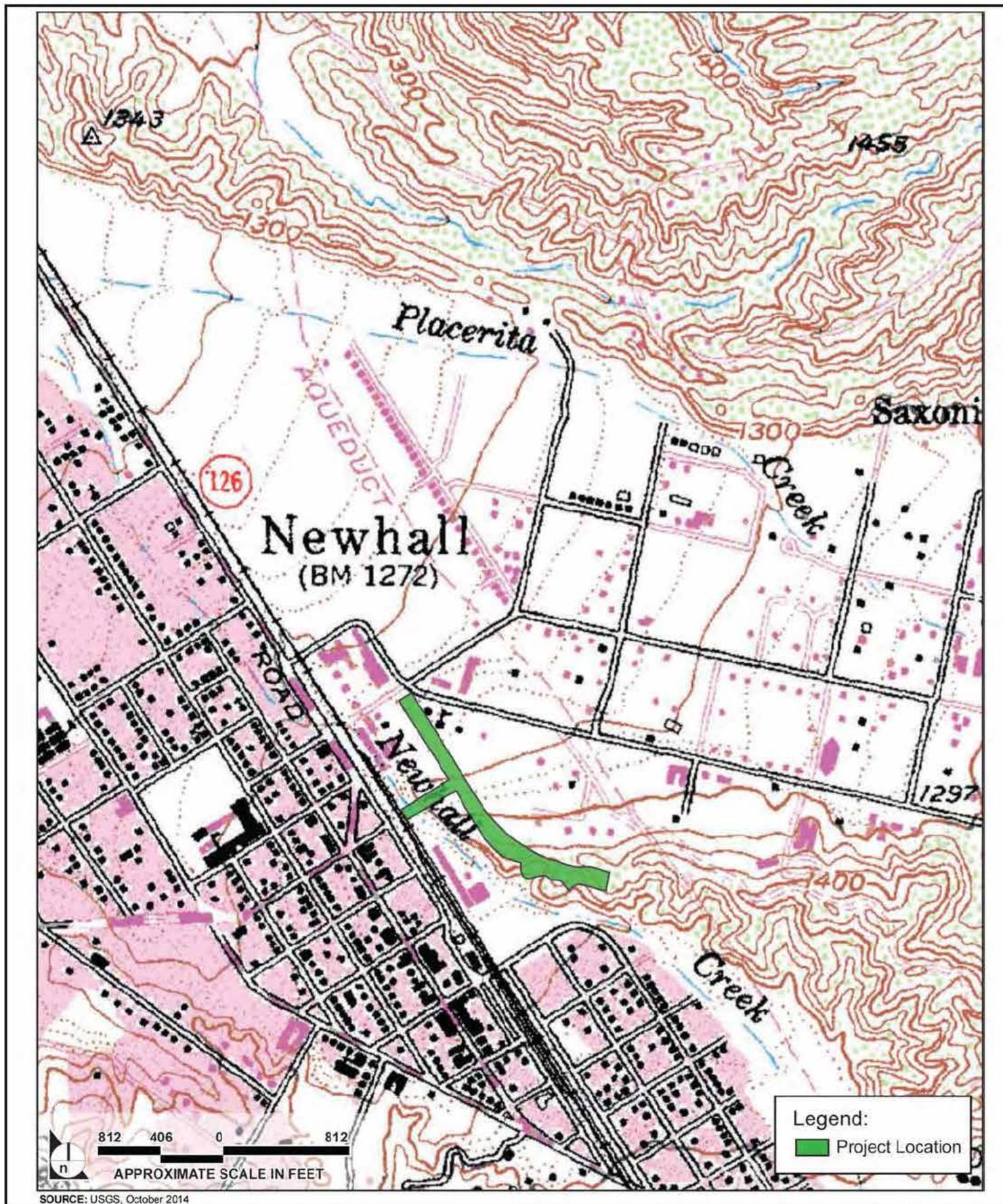
Description of the Study Area

The Project Site is located at the intersection of Lyons Avenue and Railroad Avenue and extends eastward towards the General Plan alignment for Dockweiler Drive towards The Master's University and northwest towards the intersection of 12th Street and Arch Street. The Project Site also includes related infrastructure improvements that will include the closure of an at-grade crossing at the intersection of Railroad Avenue and 13th Street.

Due to the irregular shape of the Proposed Project, several terms are used to describe the Project Site in the Biological Assessment. "Project Site" is defined as the disturbance area associated with the Proposed Project inclusive of the road right-of-way and adjacent areas disturbed by grading. "Project Area" includes the Project Site as well as a 200-foot buffer occurring on either side of the grading limit line. The "Project Region" includes the Newhall, California US Geologic Survey (USGS) 7.5-minute quadrangle, in which the Project Site is located, as well as the following eight surrounding quadrangles: Mint Canyon, Green Valley, Warm Springs Mountain, Whitaker Peak, Val Verde, Santa Susana, Oat Mountain and San Fernando.

Elevations on the Project Site range from approximately 1,260 to 1,285 feet and the Project Site totals approximately 6.67 acres. Approximately 2 acres of this area is already paved or otherwise developed. Figure 4.3-1, Project Location Map, depicts the Project Site location and topography.

Existing land uses in the vicinity of the Project Site include railroad tracks and a train station to the south, industrial and commercial development to the southwest, west, and northwest and north. Rural residential land uses occur to the northeast and undeveloped open space occurs east of the Project Site.



Source: Impact Sciences, Inc., April 2015

Figure 4.3-1
Project Location Map

Literature Search

The literature search conducted in the Biological Assessment indicated several special-status plant and wildlife species have been recorded from the Project Region. Only observed species and those with a moderate to high potential of occurrence on the Project Site or area are described in the Biological Assessment. However, all species defined within a 9-quad search, including the Project Site, are presented, and analyzed in the Special Status Species Tables (See Appendices A and B of the Biological Assessment).

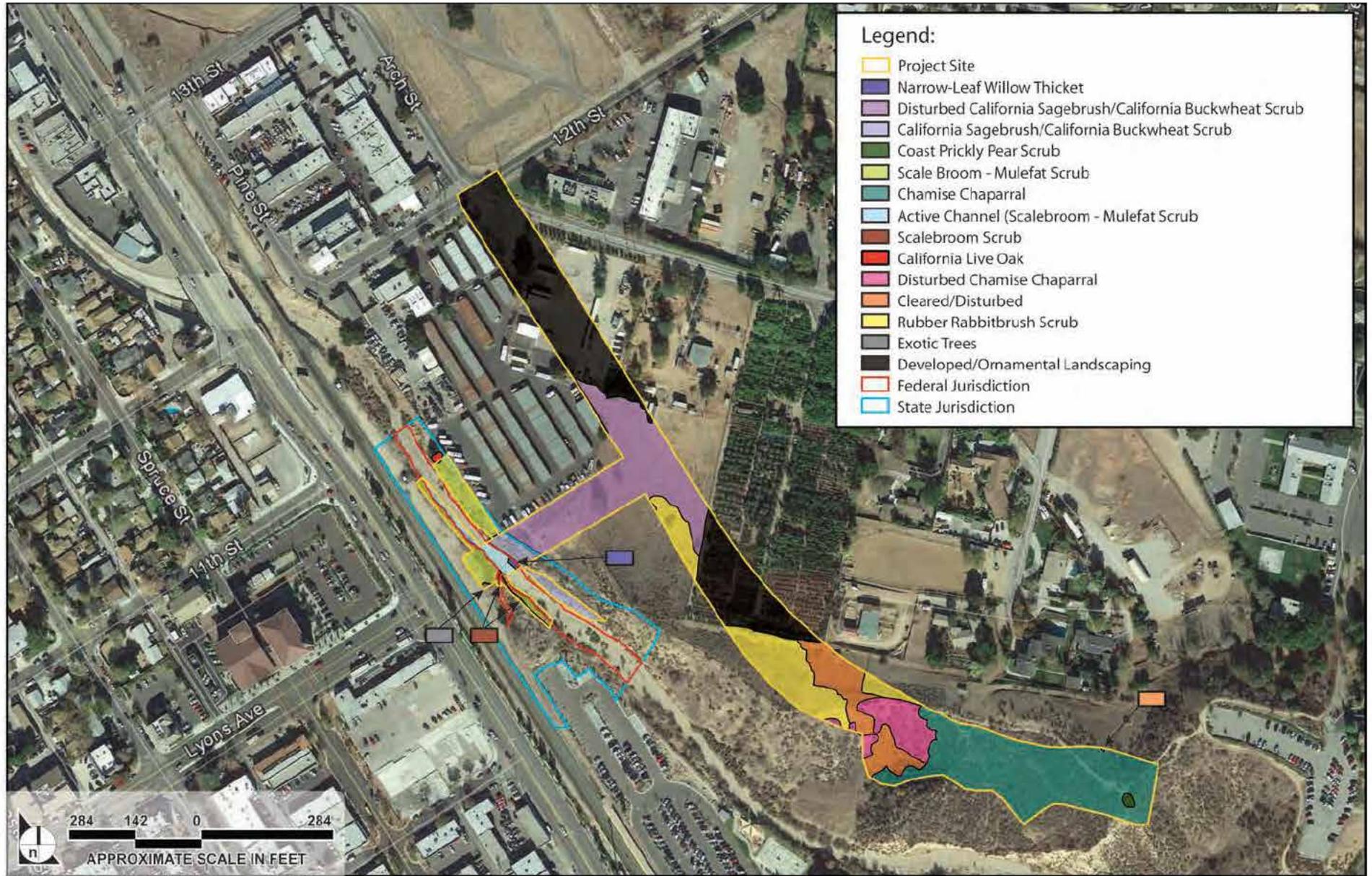
Special status species include species listed as Endangered, Threatened, or Rare under the federal or state Endangered Species Acts, Candidate Species for listing as Endangered or Threatened, California Fully Protected Species, and, pursuant to State CEQA Guidelines Section 15380(d), all other species tracked by the California Natural Diversity Database (CNDDDB) which are considered by the California Department of Fish and Wildlife (CDFW) to be those species of greatest conservation concern. Plant species with a California Rare Plant Rank (Rank) of 1 (plants presumed extinct in California, or Rare, Threatened, or Endangered in California and elsewhere), Rank 2 (plants that are Rare, Threatened, or Endangered in California but more common elsewhere), or Rank 4 (plants of limited distribution in California) are included in this definition. Plant species with a Rare Plant Rank of 3 (plants for which insufficient information is available to determine their status) are not included in this definition. Species tracked by the CNDDDB are listed in CDFW's lists of Special Plants and Special Animals.

Field Surveys

On June 17, July 17, and October 10, 2013, on-site field surveys were conducted by Impact Sciences biologists to delineate jurisdictional resources, inventory wildlife and plants, and map vegetation associations that occur within the project site and area. The entire project area was traversed along meandering transects. Vegetation associations were mapped in the field using aerial photographs and direct observation. For the jurisdictional delineation, features within the project area were assessed for indicators of stream, riparian, or wetland functions. Plant taxonomy used in the delineation followed the current flora of California.

Vegetation Communities

Seven distinct native vegetation communities were identified within the Project Site. In descending order of prevalence, these include chamise chaparral, rubber rabbitbrush scrub, scale broom/mulefat scrub, California sagebrush/California buckwheat scrub, scale broom scrub, coast prickly pear scrub, and narrow-leaf willow thicket. Developed and disturbed areas were also mapped, and include developed/ornamental landscaping, cleared/disturbed areas, exotic trees, and components of the native plant communities listed above. Each of these vegetation communities is shown in Figure 4.3-2, Vegetation Communities, and described below.



Source: Impact Sciences, Inc., 2015



Figure 4.3-2
Vegetation Communities

Chamise Chaparral (*Adenostoma fasciculatum*) Alliance (1.64 acres): This is the dominant native vegetation association within the Project Site. This community is dominated by chamise along with gray California buckwheat (*Eriogonum fasciculatum* var. *polifolium*), occasional chaparral yucca (*Hesperoyucca whipplei*). This alliance dominates the southeastern portion of the Project Site and includes a small pocket of coast prickly pear cactus scrub (*Opuntia littoralis*).

Disturbed Chamise Chaparral (0.32 acre): An area of Disturbed Chamise Chaparral Alliance also occurs in the southeastern portion of the Project Site, adjacent to cleared/disturbed areas.

Rubber Rabbitbrush (*Ericameria nauseosa*) Scrub Alliance (0.74 acre): This Alliance is dominated by rubber rabbitbrush, along with occasional big sagebrush (*Artemisia tridentata*) and California buckwheat (*Eriogonum fasciculatum*) and occurs in three areas of the Project Site. Rubber rabbitbrush is a fast-growing shrub that develops quickly after disturbance.

Scalebroom–Mulefat Scrub (*Lepidospartum squamatum*–*Baccharis salicifolia* Shrubland Alliance) (0.43 acre): Scalebroom-mulefat scrub occurs on the banks (0.32 acre) and in the active channel of Newhall Creek (0.11 acre). Dominant plants present within this alliance include scalebroom and mulefat, occurring together in densities ranging from 10 percent to 40 percent cover. Figure 4.3-2 illustrates the separation, but for the purposes of this discussion, it is considered one habitat. Vegetation is sparse within the Newhall Creek channel. The most common species include scalebroom and mulefat, together resulting in less than 10 percent cover. With the exception of a small cluster of narrow-leaf willow (described below), the creek channel is characterized as a scoured sandy streambed.

California Sagebrush-California Buckwheat Scrub (*Artemisia californica*-*Eriogonum fasciculatum* Shrubland Alliance) (0.18 acre): The area identified as California Sagebrush-California Buckwheat Scrub supports approximately 80 percent native cover where it occurs on a south-facing slope above Newhall Creek in the southwestern portion of the Project Site. Sawyer and Keeler-Wolf describe this plant community as *Artemisia californica*-*Eriogonum fasciculatum* Shrubland Alliance since the dominant shrub is California sagebrush and the codominant shrub is California buckwheat. Other shrubs present include chamise (*Adenostoma fasciculatum*), black sage (*Salvia mellifera*), non-native grasses and forbs such as wild oats (*Avena* sp.), and brome (e.g., *Bromus* sp.).

Disturbed California Sagebrush-California Buckwheat Scrub (1.28 acres): An additional area of disturbed California Sagebrush-California Buckwheat Scrub occurs near the center of the Project Site. This community has undergone disturbance in the recent past, evidenced by the sparse nature of the vegetation and influx of non-native species. Remnants of California sagebrush and California buckwheat remain, though the area is now co-dominated by non-native grasses and forbs including summer mustard (*Hirschfeldia incana*), tree tobacco (*Nicotiana glauca*) and yellow star thistle (*Centaurea solstitialis*). The weedy native cocklebur (*Xanthium strumarium*) is also present.

Scalebroom Scrub (*Lepidospartum squamatum* Shrubland Alliance) (0.02 acre): Areas dominated by scalebroom are present on both sides of Newhall Creek in the south-western portion of the Project Site

within a relatively flat area. This community includes a few scattered mulefat and big sagebrush (*Artemisia tridentata*) shrubs.

Coast Prickly Pear Scrub - *Opuntia littoralis* Shrubland Alliance (0.015 acre): One small patch of coast prickly pear is found in the extreme southeast extent of the property, surrounded entirely by chamise chaparral.

Narrow-Leaf (Sandbar) Willow Thickets - *Salix exigua* Shrubland Alliance (0.007 acre): Narrow-leaf willows occur in a small stand (25 feet x 12 feet) within the alignment of the proposed bridge. While this species is a wetland indicator, other wetland indicators are absent. The vegetation occurs on the opposite side of Newhall Creek from the ephemeral tributary, and likely receives periodic dry-season runoff from streets to the west.

Coast Live Oak (0.008 acre): Two coast live oak trees (*Quercus agrifolia*) occur within the Proposed Project area along with one blue elderberry (*Sambucus nigra ssp. caerulea*).

Developed/Ornamental Landscaping (1.98 acre): These areas support structures, pavement, or non-native ornamental landscaping associated with development. This is the second largest vegetation association within the Project Site. Two small clusters of non-native locust trees (*Robinia sp.*) are situated within the Project Site, between the railroad tracks and Newhall Creek in the southern portion of the Project Site, and occupy approximately 178 square feet (0.004 acre). These exotic (non-native) either volunteered or where planted. This species is considered undesirable because of its tendency to invade natural areas where it may out-compete native plants.

Cleared/Disturbed Areas (0.46 acre): This area occurs in several small locations generally in the southern portion of the Project Site. These areas are nearly devoid of vegetation, supporting mostly open bare soil.

Wildlife

During the surveys conducted for the Biological Assessment weather was warm and clear, providing conditions suitable for high wildlife activity. However, due to the relatively small size of the Project Site and area, combined with the presence of nearby urban development and the associated human disturbance, wildlife diversity on the Project Site is relatively low. The only reptile observed on site was side-blotched lizard (*Uta stansburiana*). Tracks, scat, burrows, and other sign observed indicate the presence of California ground squirrel (*Spermophilus beecheyi*) and Botta's pocket gopher (*Thomomys bottae*). Common bird species recorded during the field surveys included mourning dove (*Zenaidura macroura*), American crow (*Corvus brachyrhynchos*), California towhee (*Melospiza crissalis*), house finch (*Haemorhous mexicanus*), and Say's phoebe (*Sayornis saya*). All of these species are relatively tolerant of human encroachment. Several additional avian species are expected to occur on site seasonally. Small rodents including Botta's pocket gopher (*Thomomys bottae*) and deer mouse (*Peromyscus maniculatus*) are likely present and evidence of California ground squirrel (*Otospermophilus beecheyi*) and evidence of coyote (*Canis latrans*) were observed.

Wildlife Movement

Habitat used by wildlife as a movement corridor generally link large areas of open space that are otherwise separated by rugged terrain, changes in vegetation, human disturbance, or the encroachment of urban development. The fragmentation of natural habitat creates isolated 'islands' of vegetation that may not individually provide sufficient area to accommodate sustainable populations and can adversely impact genetic and species diversity. Corridors mitigate the effects of this fragmentation by: (1) allowing animals to move between remaining habitats, which allows depleted populations to be replenished and promotes genetic exchange with separate populations; (2) provide escape routes from fire, predators, and human disturbances, thus reducing the risk that catastrophic events (such as fire, flood, or disease) will result in population or species extinction; and (3) serving as travel paths for animals that require larger home ranges to meet their normal requirements of food, water and cover.

The Project Site is generally surrounded on three sides by development, including road networks. However, Newhall Creek provides a passage through the developed areas between the Santa Clara River and the Angeles National Forest to the southeast.

Stream corridors in general are considered important movement corridors for wildlife, because they provide water, food, and often cover by riparian vegetation for protection from predators. On and near the Project Site Newhall Creek does not flow year-round. Riparian vegetation on the Project Site is limited to sparse shrubs, and steep banks on the Project Site also limit available cover. However, Newhall Creek does provide, as stated above, a connection between the Santa Clara River and the Angeles National Forest to the southeast. Although, much of the length of the creek occurs adjacent to dense development and wildlife activity is expected to be somewhat limited, Newhall Creek is considered part of a wildlife movement or migration corridor that connects larger areas of natural open space.

Special-Status Plant and Animal Resources

Based upon review of the California Natural Diversity Database (CNDDDB) database for special-status plant species of the Newhall, CA and eight adjacent quadrangles, 37 special-status plant and 39 special-status animal species have been reported from the region.

The potential for special-status species to occur on the Project Site is based on the proximity of the Project Site to previously recorded occurrences in the CNDDDB database, habitat requirements of each species, evaluation of on-site vegetation and habitat quality, topography, elevation, soils, surrounding land uses, and geographic ranges of special-status plant and wildlife species known to occur in the region. Potential special-status plant species that may occur on project site is summarized in Appendix A of the Biological Assessment, Special-Status Plant Species Recorded from the Project Region. Likewise, special status wildlife species recorded in the region that may occur on the Project Site are summarized in Appendix B of the Biological Assessment, Special-Status Wildlife Species Recorded from the Project Region. The occurrence potential described in Appendices A and B are classified according to the following:

Not Expected: There is no suitable habitat present on the proposed project site (i.e., habitats on the proposed project site are clearly unsuitable for the species requirements [e.g., foraging, breeding, cover, substrate, elevation hydrology, plant community, disturbance regime, etc.]). The species has an extremely low probability of being found on the proposed project site and no further surveys are required.

Low Potential: Either significantly limited quantity and/or quality of suitable habitat is present on the proposed project site (i.e., not enough area of the habitat is present to support the species, few of the habitat components meeting the species requirements are present and/or the majority of habitat on the proposed project site is unsuitable or of very low quality). There are no or few recent known records of occurrence in the near vicinity of the proposed project site. The species has a low probability of being found on the proposed project site and no further surveys are required.

Moderate Potential: Some suitable habitat is present on the proposed project site (i.e., some of the habitat components meeting the species requirements are present and/or the quantity the habitat on the proposed project site is marginal). Additionally, there are known records of occurrences in the region of the proposed project site, but not necessarily in the immediate vicinity. The species has a moderate probability of being found on the proposed project site and additional surveys may be required.

High Potential: Suitable quantity and quality of habitat is present on the proposed project site (i.e., all habitat components meeting the species requirements are present and/or habitat(s) on the proposed project site is highly suitable or of high quality). Additionally, there are recent known records of occurrences in the vicinity of the proposed project site. Species having a high probability of being found on the proposed project site may require additional surveys to fully determine presence/absence.

Present: Species was observed on the proposed project site during surveys associated with this report or by other persons.

Special-Status Plants

Based on habitat conditions and the small size of Project Site, only general botanical surveys were conducted on the Project Site and area. Focused rare plant surveys were performed adjacent to and east of the Project Site. The only special-status plants observed during the field investigations were two coast live oaks. No other special-status plants are considered to have a high potential for occurrence within the Project Site.

Native oak trees are protected under City of Santa Clarita Oak Tree Ordinance (Ordinance No. 89-10, passed by the City Council on April 25, 1989) and the City's Oak Tree Preservation and Protection Guidelines (adopted September 11, 1990). The City of Santa Clarita's Oak Tree Preservation ordinance (Unified Development Code §17.51.040) requires the preservation of all healthy oak trees and that

removal, cutting, pruning, relocation, damage, or encroachment into the protected zone of any oak trees measuring 6 inches or larger in circumference (DBH, diameter at breast height) on public or private property can only be done in accordance with a valid oak tree permit issued by the City.

Special-Status Wildlife

No special-status wildlife species were directly observed during field investigations conducted on the Project Site or area. Although Newhall Creek traverses the Project Site, it is considered a seasonal drainage, and it is apparent within the Project Site, when flows do occur, they are rapid enough to scour the channel. Therefore, none of the special-status fish defined in Appendix B of the Biological Assessment are expected to occur on site, with the possible exception of a potential temporary presence after storm events. Likewise, aquatic conditions are not suitable for special-status amphibians defined in Appendix B of the Biological Assessment. In most areas of the Project Site the banks of Newhall Creek are too severe for amphibians to traverse. As such, they too are expected to have no more than a low potential for occurrence. Some of the more highly motile species such as birds and bats may briefly and infrequently occur on site to forage. However, there is no on-site habitat of a size or quality that could reasonably support a sustainable resident population of any of the special-status wildlife species identified in Appendix B of the Biological Assessment. Notwithstanding, one special-status reptile is considered to have a moderate potential to occur on site.

Silvery legless lizard (*Anniella pulchra pulchra*), California Species of Special Concern. This small lizard is often mistaken for a snake or worm since, as it has no limbs. Silvery legless lizard spends most of its life below surface soils where it forages on insects and larvae. It is most commonly found in and around the roots of trees and shrubs, often beneath leaf litter where its prey is most abundant. Moisture is a key ingredient in its habitat requirement. Silvery legless lizards will dig deeper into the soils to reach the correct moisture level. As such, this species is rarely observed unless one actively seeks it out. Though apparently very dry at the surface, some of areas within the Project Site may have sub-surface soils with the moisture content necessary to support this species. Therefore silvery legless lizard is considered to have a moderate potential for occurrence on the proposed Project Site.

Jurisdictional Waters, Streambed, and Riparian Resources

The portion of Newhall Creek present on the proposed Project Site is under the jurisdictional authority of federal and state regulatory agencies. Impacts to “Waters,” streambeds and adjacent riparian vegetation, as defined in the regulations cited below, typically require authorizations from these agencies. Regulatory agencies and the limits of their jurisdiction are discussed below.

Regulatory Setting

Federal Regulations

U.S. Army Corps of Engineers (ACOE)

Federal regulations of “Waters of the United States” stem from Section 10 of the Federal Rivers and Harbors Act of 1899, enacted to regulate activities within navigable waters. In 1972, the federal Clean Water Act was passed. This act regulates discharges into Waters of the United States and Section 404 of this act regulates activities including fills placed into wetlands that are adjacent to navigable waters.

Waters of the United States are defined in 33 CFR 328.3(a) as:

- All waters that are currently used, were used in the past, or may be susceptible to use in interstate or foreign commerce, including all waters that are subject to the ebb and flow of the tide.
- All interstate waters including interstate wetlands.
- All other waters such as intrastate lakes, rivers, streams (including intermittent streams), mudflats, potholes, wet meadows, playa lakes, or natural ponds, the use, degradation or destruction of which could affect interstate or foreign commerce including any such waters.
- Waters that are or could be used by interstate or foreign travelers for recreational or other purposes.
- Waters from which fish or shellfish are or could be taken and sold in interstate or foreign commerce.
- Waters that are used or could be used for industrial purpose by industries in interstate commerce.
- All impoundments of waters otherwise defined as Waters of the US under the definition.
- The territorial seas.
- Tributaries of Waters of the US.
- Wetlands adjacent to Waters of the US.

USACE jurisdiction in non-tidal waters typically extends to the ordinary high water mark (OHWM). The OHWM for intermittent streams, for example, can be determined by “the fluctuations of water as indicated by physical characteristics such as clear, natural lines impressed on the bank, shelving, changes in the character of soil, destruction of terrestrial vegetation, the presence of litter and debris, or other appropriate means that consider the characteristics of the surrounding areas” (33 CFR 328.3(e)). In arid areas of the southwest, the OHWM may occur at a lower level than where the typical physical indicators are present, due to unusually high flows not occurring on a typical annual cycle (Allen, et al. 2001). Most impacts to areas delineated as Waters of the United States, if determined to be jurisdictional by the USACE, require a project to obtain approval under the authority of the Clean Water Act and its implementing regulations.

State Regulations

California Department of Fish and Wildlife (CDFW)

The State of California regulates water resources under Sections 1600 to 1619 of the Fish and Game Code of California. Section 1602 mandates that:

An entity may not substantially divert or obstruct the natural flow of, or substantially change or use any material from the bed, channel, or bank of any river, stream, or lake or dispose of debris, waste, or other material where it may pass into any river stream, or lake.

Unless certain requirements are met, CDFW considers most natural drainages to be streambeds unless it can be demonstrated otherwise. Streambeds are defined in the California Code of Regulations Title 14, Chapter 1, Section 1.72 as follows:

A stream is a body of water that flows at least periodically or intermittently through a bed or channel having banks and that support fish or other aquatic life. This includes watercourses having surface or subsurface flow that supports or has supported riparian vegetation.

CDFW jurisdiction includes ephemeral, intermittent, and perennial watercourses, and is often extended to the limit of riparian habitats that are located contiguous to the water resource that function as part of the watercourse system. In this analysis, the area generally corresponding to the limit of riparian habitats located contiguous to the water resource is referred to as the “resource line.” Section 2785(e) of the Fish and Game Code of California states:

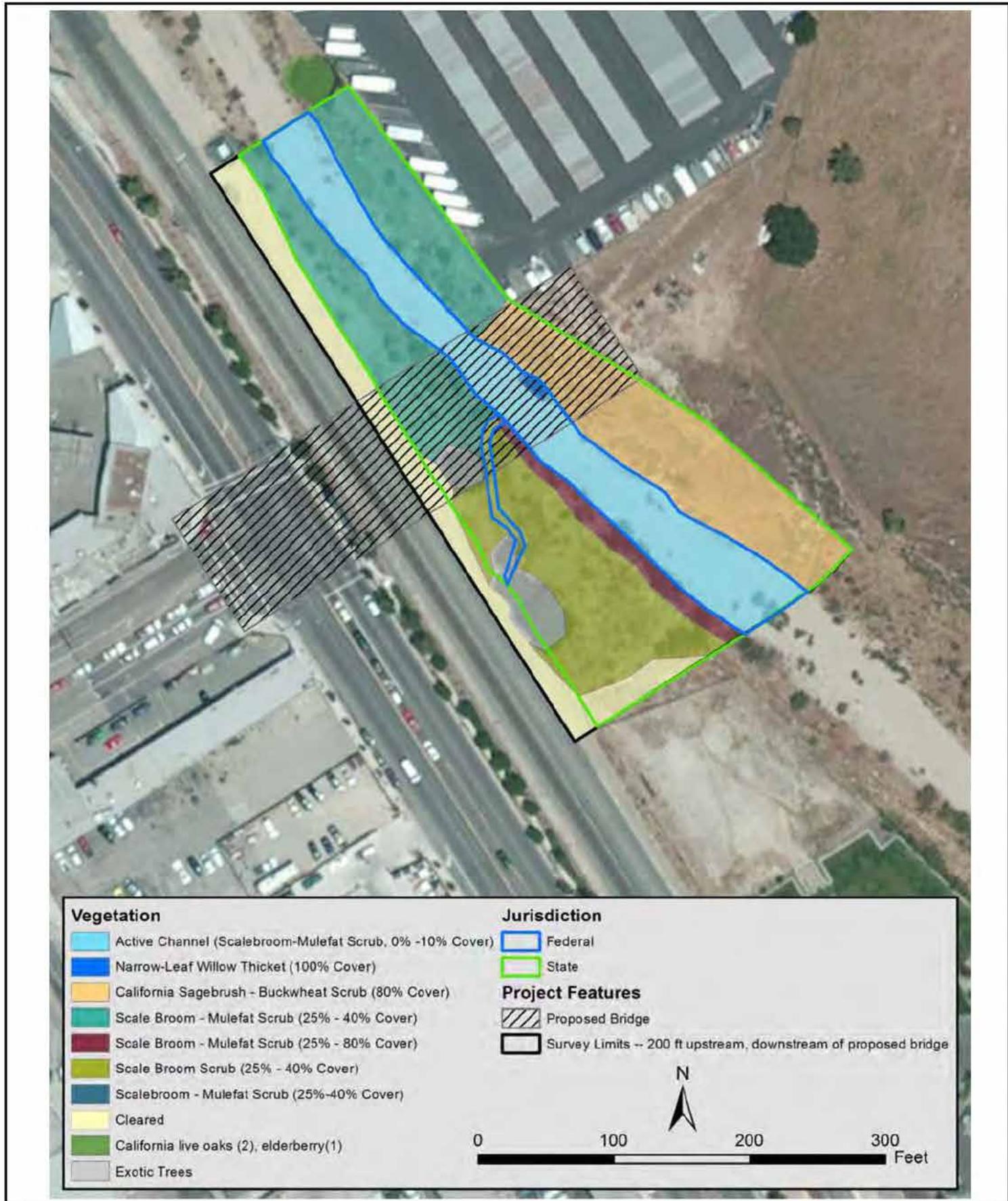
Riparian habitat means lands which contain habitat which grows close to and which depends on soil moisture from a nearby freshwater source.

Local Regulations

Regional Water Quality Control Board

Section 401 of the Federal Clean Water Act authorizes the State of California to certify federal permits and licenses. The state’s implementing regulations to conduct certifications are codified under the California Code of Regulations Title 23 Waters, Sections 3830–3869. Projects qualifying for an ACOE Section 404 Permit must submit materials for review to the appropriate Regional Water Quality Control Board (RWQCB) and request a Section 401 Certification. Much of the same information (project description, potential impacts, and mitigation measures) necessary to apply for ACOE Section 404 and Fish and Game Code Section 1603 Permits is required for the Section 401 Certification.

Direct and indirect impacts on wetland and riparian areas may also be subject to the jurisdiction of several additional state and federal agencies, including the Los Angeles RWQCB.



Source: Impact Sciences, Inc., April 2015



Figure 4.3-3
Vegetation Types and Jurisdiction Limits

Delineation Results

A delineation of regulatory agency jurisdictional limits was performed in September 2013. A map illustrating the vegetation and jurisdictional features in the survey area is depicted in Figure 4.3-3. Two jurisdictional features are defined within the Project Site, area and region:

1. **Newhall Creek.** Upstream of its confluence with Placerita Creek and the south fork of the Santa Clara River. This creek is mapped by the USGS as a “blue-line” intermittent stream. On and near the Project Site the direction of flow is from southeast to northwest. Banks of the creek are nearly vertical, with the south bank containing artificial fill (pieces of concrete and asphalt). Railroad tracks and Railroad Avenue are situated to the west, beyond the top of the bank. Areas immediately east of the creek are vacant except for an industrial yard northeast of the proposed bridge location. No surface water was present during the April survey and sparse vegetation cover within the channel indicates frequent scour during the rainy season. Therefore, this wetland feature on the Project Site is best described as an intermittent riverine, relatively permanent water (“RPW”) that has seasonal continuous flow, is a tributary to the Santa Clara River which flows into the Pacific Ocean, and can be defined as a traditionally navigable water (TNW).

On the Project Site, vegetation and surface features indicate that seasonal flows migrate across the entire channel, which averages 35 feet in width at the base (Federal jurisdiction). The distance between the tops of the banks (limits of State jurisdiction) average approximately 100 feet. No indicators of prolonged water saturation or ponding, such as surface mud cracks, were observed on-site during the field survey.

2. **Un-named ephemeral tributary to Newhall Creek.** This narrow tributary is about 3.5 feet in width at its base (Federal jurisdiction) and is entirely within State jurisdiction over Newhall Creek. It is assumed that flow from this tributary enters the project area from a culvert underneath the railroad tracks and Railroad Avenue (this could not be confirmed during the survey due to presence of a homeless camp at the presumed culvert location). The distinct bed and bank structure of this feature, and regional topography, indicate this tributary is more than a “gully” resulting from localized erosion. Wetland indicators are absent from this feature.

Appendix C of the Biological Assessment provides details regarding the vegetation occurring within the delineation survey boundaries. Of the vegetation identified in this area, only narrow-leaf willow thicket is a wetland indicator (*Salix exigua* – Facultative Wet). However, it is concluded that this thicket is probably not a jurisdictional wetland at the Federal or State level.

Wetland Determination

Federal

Hydrology and soils present in the Project Site and area (floodplains/gravel bars and sand) are naturally problematic for wetland delineation. The following paragraphs include excerpts (in italics) from the Arid

West supplement of the wetland determination procedure for problematic sites where soils may meet the definition of a hydric soil but do not exhibit typical indicators. Our observations are described for each step of the procedure.

1. *Verify that one or more indicators of hydrophytic vegetation are present or that the vegetation is disturbed or problematic. If so, proceed to step 2.*

Site observations: Narrow-leaf willow has an indicator ranking for the Arid West of Facultative Wetland. Therefore, it can be concluded hydrophytic vegetation is present.

2. *Verify that at least one primary or two secondary indicators of wetland hydrology are present or that indicators are absent due to disturbance or other factors. If so, proceed to step 3. If indicators of hydrophytic vegetation and/or wetland hydrology are absent, then the area is probably no-wetland and no further analysis is required.*

Site observations: No other primary indicators of wetland hydrology are present. Only one secondary indicator of wetland hydrology (dominance of Facultative Wet vegetation) is present.

Based on this information, and the observation that redoximorphic soil features are sparse and, where present, are faintly expressed, it can be concluded that the willow thicket (300 square feet or 0.007 acre) is probably not a Federally jurisdictional wetland. Unfortunately, the Arid West procedure does not allow for a more definitive conclusion.

State

According to the wetland definition at the State level, it is concluded that the narrow-leaf willow thicket would not meet the definition of wetland. While narrow-leaf willow is a hydrophyte, there is no evidence of continuous or recurrent saturation of the upper substrate and no evidence of anaerobic conditions are present.

Non-Wetland Jurisdiction

The proposed bridge will impact Newhall Creek in a section of the creek that is classified as “riverine and relatively permanent water, with continuous flow at least seasonally”. The bridge may also impact a narrow, ephemeral tributary to Newhall Creek. The extent of permanent and temporary construction impacts need to be known in order to provide a more precise analysis of impacts.

4.3.3 ENVIRONMENTAL IMPACTS

Methodology

Direct impacts of a proposed project on biological resources typically involve the loss, modification, or disturbance of natural habitat (i.e., plant communities or other naturally occurring areas) which in turn, directly and indirectly affect plant and wildlife species dependent on that habitat. The significance of

potential impacts on biological resource is determined by an evaluation of the overall biological value of a habitat area in comparison with significance threshold criteria that are described below. The relative value of each of the plant communities present on site is measured by such factors as disturbance history, biological diversity, importance to particular plant and wildlife species, uniqueness or sensitivity status, as well as the surrounding environment and the presence of special-status resources. The significance of impacts with respect to direct impacts on individuals or populations of plant and animal species takes into consideration the number of individual plants or animals potentially affected, how common or uncommon the species is both on the Project Site and from a regional perspective, and the sensitivity status if the species is considered special status by resource agencies. These factors are evaluated based on the results of on-site biological surveys and studies, results of literature and database reviews, and established and recognized ecological and biodiversity theories and assumptions.

CEQA Guidelines Thresholds of Significance

According to Checklist Questions IV(a) through V(f) in Appendix G of the State CEQA Guidelines, a project may have a significant environmental impact if it were to

- 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 CDFW or USFWS;
- Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, or regulations or by the CDFW or USFWS;
- Have a substantial adverse effect on federally protected wetlands as defined by Section 404 of the Clean Water Act (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means;
- Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites;
- Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance; or
- Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state Habitat Conservation Plan.

Project Impacts

Habitat Modification

Vegetation

As described above, and depicted in Figure 4.3-2, eight vegetation communities occur on the Project Site that include: California Sagebrush-California Buckwheat Scrub, Disturbed California Sagebrush-California Buckwheat Scrub, Scale Broom–Mulefat scrub, Scalebroom Scrub, Active Channel, Exotic Trees, Developed/ Ornamental Landscaping, and Cleared. Site grading plans indicate that within the Project Site 2.32 acres of vegetation would be removed (100 percent of the vegetation resources present).

Of the vegetation communities impacted Disturbed California Sagebrush-California Buckwheat Scrub is the dominant plant community present by area and approximately 0.63 acre of this habitat would be lost through site grading and project implementation.

Due to its proximity to adjacent developed areas, the Project Site has been subject to historic disturbances. Combined with its small size (2.32 acres), invasive plant species observed on the Project Site (e.g. mustard, tree tobacco, cocklebur, yellow star thistle) indicate a high percentage of plants that are generally associated with ruderal or highly disturbed places.

As concluded in the Biological Assessment, the loss of 2.32 acres of vegetation on the Project Site is considered adverse. However, due to the disturbance history, its small size, the lack of sensitive plant communities, the lack of structure for wildlife, and high percentage of invasive and non-native plant species generally associated with disturbed areas, impacts associated with the loss of 2.32 acres of vegetation present on-site is considered less than significant.

Special-Status Plants

As discussed above, the only special-status plants observed during the field investigations were two coast live oaks. No other special-status plants are considered to have a high potential for occurrence within the Project Site. Native oak trees are protected under City of Santa Clarita Oak Tree Ordinance (Ordinance No. 89-10, passed by the City Council on April 25, 1989) and the City's Oak Tree Preservation and Protection Guidelines (adopted September 11, 1990). A permit is required for encroachment into the Protected Zone, defined as 5 feet outside the dripline and further defined as extending no less than 15 feet outward from the trunk of an oak tree. The City of Santa Clarita requires that all potential impacts to oak trees be preceded by an application to the City that includes a detailed oak tree report and that loss of or damage to protected oaks be mitigated at a minimum 2:1 ratio.

Based upon the development and grading footprint of the proposed project as depicted in Figure 2.9, Proposed Site Plan at Lyons Avenue, it has been determined that the 2 oak trees that occur within the project limits would be required to be removed for project construction. The removal of or encroachment to oak trees as a result of project construction would be considered a significant impact under both the City of Santa Clarita and CEQA. Replacement oak trees would be planted in the number necessary to comply with the requirements stipulated in the Oak Tree Permit issued by the City. With approval of the required oak tree permits, and implementation of Mitigation Measure 4.3-7, impacts upon the loss or pruning of any oak tree would be reduced to less than significant levels.

Wildlife

Common Wildlife

Construction activity and grading operations of the Proposed Project would disturb and/or threaten the survival of common wildlife species present. Some species would be expected to relocate to other areas of similar habitat within the local area. However, wildlife that emigrate to off-site areas are vulnerable to mortality by predation, potential conflicts with people and cars, and unsuccessful competition for food

and territory. It is expected that species of low mobility (particularly small mammals, amphibians, and reptiles) would be lost during site preparation, grading and construction.

Site grading and project implementation would eliminate approximately 2.32 acres of natural habitat present on-site, and would result in an incremental reduction in native wildlife species abundance and diversity. However, due to nearby urban development and the associated human disturbance, field investigations indicate wildlife diversity and abundance on the Project Site is relatively low. The only reptile observed on site was side-blotched lizard (*Uta stansburiana*). Tracks, scat, burrows, and other sign observed indicate the presence of California ground squirrel (*Spermophilus beecheyi*) and Botta's pocket gopher (*Thomomys bottae*). Small rodents including deer mouse (*Peromyscus maniculatus*) are likely also present and evidence of coyote (*Canis latrans*) was observed. Common bird species recorded during the field surveys included mourning dove (*Zenaida macroura*), American crow (*Corvus brachyrhynchos*), California towhee (*Melospiza crissalis*), house finch (*Haemorrhous mexicanus*), and Say's phoebe (*Sayornis saya*). All of these species are relatively tolerant of human encroachment. Several additional avian species are expected to occur on site seasonally. Because of the relatively common occurrence of these wildlife species that would be displaced or lost, project implementation is not expected to cause a current wildlife population on or adjacent to the Project Site to drop below self-sustaining levels. Therefore, impacts to common wildlife species is not considered significant.

Special-Status Wildlife

An assessment of biological resources present on the Project Site determined that one special-status wildlife species has a moderate potential to occur within the Project Site and could be directly impact through project implementation.

Silvery legless lizard is a California species of special concern. On the Project Site, some limited habitat suitable for this species is present in the sandier terraces of Newhall Creek and possibly within the areas of scrub habitat north of the creek.

This species is almost completely fossorial (i.e., occurring beneath the surface) and is dependent upon moisture levels in the soils where they live. During dry periods they will burrow deeper to find the necessary levels of moisture. As such, silvery legless lizard can be difficult to find, especially in dry seasons or years. Although sands within the Newhall Creek bed may currently be suitable for silvery legless lizard, they are unlikely to occur within the creek itself as it periodically supports storm flows and would scour any away legless lizards that could be seeking refuge. Therefore, the only suitable habitat remaining is a small area above the ordinary high water mark, north of the creek. This area may support individual species of silvery legless lizard, but is not likely to support a sustainable population.

The grading plan indicates the areas north of the Project Site would be disturbed during grading and project construction. Although it can be concluded that bridge construction associated with the Proposed Project would not impact populations of silvery legless lizard, disturbances associated with grading and implementation of the road extension may impact individuals of this California species of special concern. Therefore, impacts are considered significant without mitigation.

Additionally, most native bird species when nesting, are protected by the Migratory Bird Treaty Act and the California Fish and Game Code, which prohibit the take (defined as destroy, harm, harass, etc.) of bird nests with eggs or young. Project-related activities associated with site preparation and construction could result in the direct loss of active nests or the abandonment of active nests by adult birds should grading occur during the nesting season. The loss of active bird nests would be in conflict with the Migratory Bird Treaty Act and the California Fish and Game Code. As such, impacts to active nests are a significant impact without mitigation. Without mitigation, the Proposed Project could result in potentially significant impacts to silvery legless lizard and active nesting birds. Implementation of Mitigation Measures 4.3-1 and 4.3-2 would reduce impacts to silvery legless lizard and nesting birds to a less than significant level.

Federally Protected Wetlands

Based on field investigations, a small area of narrow-leaf willow thicket (300 square feet or 0.007 acre) is present. Where it occurs on-site, redoximorphic soil features are sparse and faintly expressed and as such the narrow-leaf willow thicket present on the Project Site is probably not a Federally jurisdictional wetland. Further, according to the wetland definition at the State level, narrow-leaf willow thicket present on-site would not meet the criteria of wetland as defined by the State of California. While narrow-leaf willow is a hydrophyte, there is no evidence of continuous or recurrent saturation of the upper substrate and no evidence of anaerobic conditions are present.

Two jurisdictional features do occur within the Project Site and area. Newhall Creek and a small ephemeral drainage that is a tributary to Newhall Creek occur on the Project Site and fall under the jurisdiction of the CDFW. Although these jurisdictional features do not support riparian vegetation or sensitive wetland resources, Newhall Creek does support features that lie within the jurisdiction of CDFW.

As discussed above, the proposed bridge and associated infrastructure would result in both temporary and permanent impacts to areas of the Newhall Creek and its associated tributary and are classified as “riverine and relatively permanent water, with continuous flow at least seasonally” and as such are under CDFW jurisdiction. Without consultation with, and a formal agreement with CDFW, such impacts would be in violation of the Fish and Game Code and, are considered a significant impact. Without mitigation, the project would result in potentially significant impacts to CDFW jurisdictional resources (i.e. Newhall Creek and its associated tributary). Mitigation Measure 4.3-3 would reduce impacts to jurisdictional resources to a less than significant level.

Wildlife Movement and Corridors

The Project Site is generally surrounded on three sides by development and road networks. However, Newhall Creek does extend through the site and provides a passage through developed areas between the Santa Clara River and the Angeles National Forest to the southeast.

Stream corridors in general are considered important movement corridors for wildlife, because they provide water, food, and often cover by riparian vegetation for protection from predators. On and near the

proposed Project Site Newhall Creek does not flow year-round. Vegetation on the Project Site is limited to sparse shrubs, and steep banks on the Project Site limit cover. However, Newhall Creek does provide, as stated above, a connection between the Santa Clara River and the Angeles National Forest. Though much of the length of the creek occurs adjacent to dense development and wildlife activity is expected to be somewhat limited, Newhall Creek is considered part of a wildlife movement or migration corridor that connects larger areas of natural open space.

To limit impacts to wildlife movement, four 25-foot wide and 8-foot deep openings in a concrete box bridge with 80-foot wide soft base and 2:1 protected side slopes is proposed where the proposed roadway extension crosses Newhall Creek. As designed, this bridge would not result in any barrier to wildlife movement and would serve to protect Newhall Creek as a functioning wildlife movement corridor. The project as proposed would not result in significant impacts to wildlife movement.

Construction Activity

Project construction (particularly site clearing and grading operations and implementation of the road surface) would have the potential to impact surrounding areas including adjacent plant communities and plant and animal species. Specifically, these impacts can include displacement and disturbance of wildlife, which could result in possible nest or den abandonment during the breeding season, siltation and erosion into drainages, excessive dust accumulation on vegetation that could result in the degradation or loss of some plant species, and soil compaction. Construction-related activities could have adverse effects on plant and wildlife habitat, and together, would be considered a significant impact. Implementation of Mitigation Measure 4.3-4 would reduce these construction-related impacts to less a less than significant level.

Operation

Increase in Populations of Non-Native Species

Subsequent to project completion, the number of non-native plant and wildlife species occurring in the vicinity of the roadway alignment would be expected to increase. These species are more adapted to urban environments could potentially displace native species because of their ability to compete more effectively for resources. Non-native plants tend to be more adaptable to urban or disturbed settings and can out-compete native plants for available resources.

However, observations indicate historical and ongoing development in the vicinity of the Project Site have already supported continual and ongoing increases and proliferation of non-native plant and wildlife species populations in the area adjacent to the Project Site. Consequently, the Proposed Project is not expected to substantially increase the distribution of non-native plants and wildlife in adjacent open space areas situated to the east. Therefore, impacts to the remaining natural areas as a result of potential increases in non-native plants and wildlife resulting from project implementation are expected to be less than significant, given compliance with Mitigation Measure 4.3-5.

Increased Light and Glare

It is logical to assume that nighttime headlamp illumination would increase in areas adjacent to the Project Site. Nighttime light can disturb breeding and foraging behavior and can potentially alter breeding cycles of birds, mammals, and nocturnal invertebrates. Headlamp illumination could deter some animal species, especially the larger mammals, from using Newhall Creek as a wildlife movement corridor. If uncontrolled, such light could adversely impact the composition and behavior of the animal species that occur in these areas. The Project Site is currently surrounded on three sides by development, and much of the Project Site and nearby natural area already receives some nighttime illumination from the adjacent urban areas. However, the Proposed Project would increase light and glare effects proximal to the Newhall Creek corridor. Mitigation Measure 4.3-6 would decrease this impact to less than significant.

Stormwater and Urban Runoff

It is expected that stormwater runoff would be limited to pavement runoff during periodic storm events. Runoff from paved surfaces can increase eutrophication, deplete oxygen levels, increase long-term buildup of toxic compounds and heavy metals, and other adverse effects to biological resources associated with aquatic systems. Although this impact is not quantifiable, it is reasonable to assume runoff could substantially affect special-status species potentially occurring downstream from the Project Site and incrementally diminish habitat values for fish, wildlife, or plants, and degrade the quality of the environment. As described above, any runoff that flows into the Newhall Creek could result in increased eutrophication, depleted oxygen levels, long-term build-up of toxic compounds and heavy metals downstream as Newhall Creek connects to the Santa Clara River. Although potentially significant, the City's standard stormwater requirements are specifically designed to minimize these effects. Therefore, with implementation of the required design criteria, impacts to Newhall Creek resulting from Stormwater runoff would be less than significant.

4.3.4 CUMULATIVE IMPACTS

As discussed above, the development of the Project Site would potentially result in impacts to biological resources if left unmitigated. The outlined mitigation measures would reduce those impacts to a less than significant level. There are no proposed developments in the immediate vicinity of the site. The only exception to this would be The Masters University project situated to the east, which is currently being evaluated. However, the impacts from both The Masters University project (which are being evaluated within a separate EIR) and the Dockweiler Road extension that is the subject of this analysis have been previously evaluated as part of the City's General Plan. The extension of Dockweiler Road would not be growth inducing as this project is consistent with the City's General Plan for this area. Therefore, development associated with the proposed project and other development in the vicinity of the Project Site in the City Santa Clarita, would not result in a significant cumulative impact related to biological resources.

4.3.5 MITIGATION MEASURES

With incorporation of the following Mitigation Measures, impacts associated with the Proposed Project would be mitigated to a less than significant level. The Mitigation Measures are defined below:

- 4.3-1 The applicant shall retain a qualified biologist with a CDFG Scientific Collection Permit and Memorandum of Understanding to conduct preconstruction surveys for the silvery legless lizard within the Project Site and area. Should this species be located on the Project Site during preconstruction surveys all individuals shall be relocated, with the concurrence of the City and CDFW, to an approved site with suitable habitat. Surveys and relocation of silvery legless lizard may occur prior to construction; however, focused surveys must occur within 30 days prior to construction. Survey and relocation methods shall be approved by CDFW prior to commencement of grading.
- 4.3-2 Active nests of native bird species are protected by the Migratory Bird Treaty Act (16 U.S.C. 704) and the California Fish and Game Code (Section 3503). If activities associated with construction or grading are planned during the bird nesting/breeding season, generally January through March for early nesting birds (e.g., Coopers hawks or hummingbirds) and from mid-March through September for most bird species, the applicant shall have a qualified biologist conduct surveys for active nests. The project management shall endeavor to avoid the breeding season.

In the event it is not feasible to avoid the nesting season, a qualified biologist shall perform weekly nesting bird surveys beginning 30 days prior to initiation of ground-disturbing activities, with the last survey conducted no more than three days prior to the start of clearance/construction work. If ground-disturbing activities are delayed, additional pre-construction surveys shall be conducted so that no more than three days have elapsed between the survey and ground-disturbing activities.

Surveys shall include examination of natural habitat for nesting birds. Several bird species such as killdeer and night hawks are known to nest on bare ground. Protected bird nests that are found within the construction zone shall be protected by a buffer deemed suitable by a qualified biologist, and verified by CDFW. Typically, a 300-foot buffer is required for most species and a 500-foot buffer for raptor species. Buffer areas shall be delineated with orange construction fencing or other exclusionary material that would inhibit access within the buffer zone. Installation of the exclusionary material delineating the buffer zone shall be verified by a qualified biologist prior to initiation of construction activities. The buffer zone shall remain intact and maintained while the nest is active (i.e., occupied or being constructed by the adults bird(s)) and until young birds have fledged and no continued use of the nest is observed, as determined by a qualified biologist.

- 4.3-3 Prior to project construction, the following is required to mitigate impacts to jurisdictional resources:

- a. Areas of impact proposed by the project shall be calculated and permits for these proposed impacts shall be obtained (the discharge of fill into ACOE jurisdictional areas will require a permit pursuant to Section 404 of the Clean Water Act and a 401 Certification from the State Water Resources Control Board, and any modification to a streambed, [analysis states none is present], will require a streambed alteration agreement from CDFW pursuant to Section 1600 of the California Fish and Game Code). Both the streambed alteration agreement and the 401 and 404 permits will require specific mitigations for any impacts within their respective jurisdictions.
- b. Because the proposed bridge is a 'span' design, it does not require footings within the bed of the stream. However, plan designs do include approximately 450 feet of bank stabilization on both sides of the stream that would lie within CDFW, ACOE and Regional Water Quality Control Board jurisdiction. Since little vegetation exists within this drainage, it is uncertain what mitigation these regulatory agencies may require.
- c. The stream in the impacted area would not be conducive to re-vegetation as the area of the project is deeply incised with little existing vegetation and newly planted vegetation would likely be washed away with the next storm event.
- d. Mitigation can be completed off site. Because there is essentially no riparian vegetation being removed with implementation of this project, revegetation off site, in a location approved by the City and CDFW, would be accomplished at a 1:1 area ratio.
- e. Upon City and agency approval of a suitable location, a detailed restoration plan shall be prepared that provides a planting palette, planting methods, and irrigation plan (as appropriate). The plan will also include a 5-year monitoring effort to ensure success of the restoration effort. The monitoring plan will include monitoring methods, monitoring frequency, success criteria, and contingency actions should the success criteria not be met for any reason. Annual monitoring reports shall be provided to both CDFW and the City.

4.3-4 The following guidelines shall be implemented to minimize impacts on remaining biological resources on the site as a result of construction and grading activities and to ensure that potential impacts on these resources will remain less than significant.

A City-approved biologist shall be retained by the applicant as a construction monitor to ensure that incidental construction impacts on retained biological resources are avoided or minimized. Responsibilities of the construction monitor shall include the following:

- Attend all pre-grading meetings to ensure that the timing and location of construction activities do not conflict with mitigation requirements.
- Conduct meetings with the contractor and other key construction personnel, describing the importance of restricting work to within the project boundaries and

outside of the preserved areas. The monitor shall also work with the contractor to determine the most appropriate staging/storage areas for equipment and materials.

- Guide the contractor in marking/flagging the construction area limits, in accordance with the final approved grading plan.
- Periodically and routinely visit the site during construction to coordinate and monitor compliance with the above provisions.

The construction contractor shall install temporary erosion control measures to reduce impacts to and protect on site drainages from excess sedimentation, siltation, and erosion. These measures shall consist of minimization of existing vegetation removal; the use of temporary soil covers, such as hydro-seeding with native species, mulch/binder and erosion control blankets to protect exposed soil from wind and rain erosion; and/or the installation of silt fencing, berms, and dikes to protect storm drain inlets and drainages.

No changing of oil or other fluids, or discarding of any trash or other construction waste materials shall occur on the Project Site. Vehicles carrying supplies, such as concrete, shall not be allowed to empty, clean out, or otherwise place materials into natural areas on or immediately adjacent to the site.

Any equipment or vehicles driven and/or operated within or adjacent to drainages shall be checked and maintained daily, to prevent leaks of materials that if introduced to water could be deleterious to aquatic life. No equipment maintenance shall be conducted within the drainage channels or within 50 feet of channels. (Fuel-powered vehicles and equipment shall not be left idling or operated beyond periods need to accomplish approved tasks.)

Construction personnel shall be prohibited from entry into areas outside the designated construction area, except for necessary construction related activities, such as surveying. All such construction activities in or adjacent to remaining open space areas shall be coordinated with the project biologist.

Standard dust control measures of the South Coast Air Quality Management District shall be implemented to reduce impacts on nearby plants and wildlife. This includes a variety of options to reduce dust including replacing ground cover in disturbed areas as quickly as possible, watering active sites regularly, and suspending all excavating and grading operations during periods of high winds.

Upon completion of construction, the contractor shall be held responsible to restore any haul roads, access roads, or staging areas that are outside of approved grading limits. This restoration shall be done in consultation with the project biologist.

- 4.3-5 Any landscaping plan(s) associated with the project shall be reviewed by a qualified biologist or resource specialist, who shall recommend appropriate provisions to prevent invasive plant species from colonizing in natural areas. These provisions may include the following: (a)

review and screening of proposed plant palette and planting plans to identify and avoid the use of invasive species; (b) weed removal during the initial planting of landscaped areas; and (c) the monitoring for and removal of weeds and other invasive plant species as part of ongoing landscape maintenance activities.

4.3-6 All street lighting shall be downcast luminaries or directional lighting with light patterns directed away from natural areas.

4.3-7 Prior to issuance of a grading permit, an Oak tree report shall be prepared and approved. All oaks that will not be removed that are regulated under the City of Santa Clarita's Oak Tree Preservation and Protection Guidelines with driplines within 50 feet of land clearing (including brush clearing) or areas to be graded shall be enclosed in a temporary fenced zone for the duration of the clearing or grading activities. Fencing shall extend to the root protection zone (i.e., the area at least 15 feet from the trunk or 5 feet beyond the drip line, whichever distance is greater). No parking or storage of equipment, solvents, or chemicals that could adversely affect the trees shall be allowed within 25 feet of the trunk at any time. Removal of the fence shall occur only after the project arborist or qualified biologist confirms the health of preserved trees.

4.3.6 LEVEL OF SIGNIFICANCE AFTER MITIGATION

With the incorporation of mitigation measures, impacts upon biological resources, including vegetation and wildlife resources would be less than significant.