



Section 5.10:

Biological Resources



5.10 BIOLOGICAL RESOURCES

This section describes the biological resources in the City of Murrieta (City) and the Sphere of Influence (SOI), and potential adverse impacts associated with implementation of the proposed General Plan 2035. Review and analysis of compliance with all Federal, State, and local laws and policies regarding biological resources have also been conducted. This section is largely based upon the information contained in the *Biological Resources Report* (LSA Associates, Inc., December 2009) (refer to Appendix H), and the Western Riverside County Multiple Species Habitat Conservation Plan and Final EIR/EIS.

5.10.1 REGULATORY SETTING

Threatened and endangered species are listed by the U.S. Fish and Wildlife Service (USFWS) and California Department of Fish and Game (CDFG). In California, three agencies generally regulate activities within inland streams, wetlands, and riparian areas: U.S. Army Corps of Engineers (ACOE); the CDFG; and the Regional Water Quality Control Board (RWQCB). The ACOE Regulatory Branch regulates activities pursuant to Section 404 of the Federal Clean Water Act (CWA) and Section 10 of the Rivers and Harbors Act. The CDFG regulates activities under CDFG Code Sections 1600-1607. The RWQCB regulates activities pursuant to Section 401 of the CWA and the California Porter-Cologne Act.

FEDERAL

Federal Endangered Species Act

The Federal Endangered Species Act (FESA) of 1973 (50 CFR 17) is intended to protect plants and animals that have been identified as being at risk of extinction and classified as either threatened or endangered. FESA also regulates the “taking” of any endangered fish or wildlife species, per Section 9 of the Act. A responsible agency or individual landowners are required to submit to a formal consultation with the USFWS to assess potential impacts to listed species as the result of a development project, pursuant to FESA Sections 7 and 10. The USFWS is required to make a determination as to the extent of impact to a particular species a project would have. If it is determined that potential impacts to a species would likely occur, measures to avoid or reduce such impacts must be identified.



Federal Clean Water Act

SECTION 404

The ACOE maintains regulatory authority over the discharge of dredged or fill material into the waters of the United States, pursuant to Section 404 of the CWA. The ACOE and United States Environmental Protection Agency (EPA) defines “fill material” as any “material placed in waters of the United States where the material has the effect of: (i) Replacing any portion of a water of the United States with dry land; or (ii) Changing the bottom elevation of any portion of the waters of the United States.” Fill material may include sand, rock, clay, construction debris, wood chips, or other similar “materials used to create any structure or infrastructure in the waters of the United States.” The term “waters of the United States” includes the following:

- All waters that have, are, or may be used in interstate or foreign commerce (including sightseeing or hunting), including all waters subject to the ebb and flow of the tide;
- Wetlands;
- All waters such as interstate lakes, rivers, streams (including intermittent streams), mudflats, sandflats, wetlands, sloughs, prairie potholes, wet meadows, playa lakes, or natural ponds; the use, degradation or destruction of which could affect interstate or foreign commerce;
- All impoundments of water mentioned above;
- All tributaries of waters mentioned above;
- Territorial seas; and,
- All wetlands adjacent to the waters mentioned above.

In the absence of wetlands, the ACOE’s jurisdiction in non-tidal waters extends to the ordinary high water mark (OHWM), which is defined as “...that line on the shore established by the fluctuations of water and indicated by physical characteristics such as a clear, natural line 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 area (33 CFR 328.3(e)).”

Wetlands generally include swamps, marshes, bogs, and similar areas. Wetlands are jointly defined by the ACOE and EPA as “those areas that are inundated or saturated by surface or groundwater at a frequency and duration sufficient to support, and under normal circumstances do support, a prevalence of vegetation typically adapted for life in saturated soil conditions (33 CFR 328.3(b)).”

On January 9, 2001, the U.S. Supreme Court issued the decision, Solid Waste Agency of Northern Cook County v. U.S. Army Corp of Engineers et al. As a result of this case, the scope of the ACOE’s Section 404 CWA regulatory permitting program was limited, restricting



ACOE's jurisdictional authority over isolated, non-navigable, intrastate waters that are not tributary or adjacent to navigable waters or tributaries (i.e., wetland conditions). The Supreme Court held that Congress did not intend for isolated, non-navigable water conditions to be covered within Section 404 of the CWA, as they are not considered to be true "waters of the U.S."

SECTION 401

The RWQCB is the primary agency responsible for protecting water quality in California. The RWQCB regulates discharges to surface waters under the Federal CWA and the California Porter-Cologne Water Quality Control Act. The RWQCB's jurisdiction extends to all waters of the State and to all waters of the United States, including wetlands (isolated and non-isolated conditions).

Through 401 Certification, Section 401 of the CWA allows the RWQCB to regulate any proposed Federally permitted activity that may affect water quality. Such activities include the discharge of dredged or fill material, as permitted by the ACOE, pursuant to Section 404 of the CWA. The RWQCB is required to provide "certification that there is reasonable assurance that an activity which may result in the discharge to waters of the United States will not violate water quality standards," pursuant to Section 401. Water Quality Certification must be based on the finding that proposed discharge will comply with applicable water quality standards, of which are given as objectives in each of the RWQCB's Basin Plans.

In addition, pursuant to the Porter-Cologne Water Quality Control Act, the State is given authority to regulate waters of the State, which are defined as any surface water or groundwater, including saline waters. As such, any person proposing to discharge waste into a water body that could affect its water quality must first file a Report of Waste Discharge if a Section 404 does not apply. "Waste" is partially defined as any waste substance associated with human habitation, including fill material discharged into water bodies.

STATE

California Endangered Species Act

The California Endangered Species Act (CESA) of 1984, in combination with the California Native Plant Protection Act of 1977, regulates the listing and take of plant and animal species designated as endangered, threatened, or rare within the State. The State of California also lists Species of Special Concern based on limited distribution, declining populations, diminishing habitat, or unusual scientific, recreational, or educational value. The CDFG is given the responsibility by the State to assess development projects for their potential to impact listed species and their habitats. State listed special-status species are also addressed through the issuance of a 2081 permit (Memorandum of Understanding).



California Fish and Game Code

Within the State of California, fish, wildlife, and native plant resources are protected and managed by the CDFG. The Fish and Game Commission and/or the CDFG are responsible for issuing permits for the take or possession of protected species. The following sections of the Code address the protected species: Section 3511 (birds); Section 4700 (mammals); Section 5050 (reptiles and amphibians); and, Section 5515 (fish).

California Department of Fish and Game Lake and Streambed Alteration Agreements

Historically, the State of California regulated activities in rivers, streams, and lakes pursuant to *California Fish and Game Code* Sections 1600-1607; however, on January 1, 2004, legislation went into effect that repealed Fish and Game Code Sections 1600-1607 and instead, added *Fish and Game Code* Sections 1600-1616. This action eliminated the separation between private/public notifications (previously 1601/1603). Section 1602 of the *Fish and Game Code* requires any person, state, or local governmental agency, or public utility to notify the CDFG before commencing any activity that would result in one or more of the following:

- Substantially obstruct or divert the natural flow of a river, stream, or lake;
- Substantially change or use any material from the bed, channel, or bank of a river, stream, or lake; or,
- Deposit or dispose of debris, waste, or other material containing crumbled, flaked, or ground pavement where it can pass into a river, stream, or lake.

Fish and Game Code Section 1602 applies to all perennial, intermittent, and ephemeral rivers, streams, and lakes within the State of California. While the jurisdictional limits are similar to the limits defined by ACOE regulations, CDFG jurisdiction includes riparian habitat supported by a river, stream, or lake with or without the presence or absence of saturated soil conditions or hydric soils. CDFG jurisdiction generally includes to the top of bank of the stream, or to the outer limit of the adjacent riparian vegetation (outer drip line), whichever is greater. Any project that occurs within or in the vicinity of a river, stream, lake, or their tributaries typically requires notification of the CDFG, including rivers or streams that flow at least periodically or permanently through a bed or channel with banks that support fish or other aquatic life, and watercourses having a surface or subsurface flow that supports or has supported riparian vegetation.

Migratory Bird Treaty Act of 1918

The Federal Migratory Bird Treaty Act (MBTA) was originally drafted to end the commercial trade in bird feathers popular in the latter part of the 1800s. The MBTA makes it illegal to take, possess, buy, sell, purchase, or barter any migratory bird listed in 50 C.F.R. Part 10, including



feathers, nests, eggs, or other avian products. The USFWS is responsible for enforcing the MBTA.

California Environmental Quality Act

In addition to specific Federal and State statutes for the protection of threatened and endangered species, *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 it can be shown that the species meets certain specified criteria. Modeled after definitions in the FESA and the section of the *California Fish and Game Code* dealing with rare or endangered plants and animals, these criteria are given in *CEQA Guidelines* Section 15380(b). The effect of Section 15380(b) is to require public agencies to undertake reviews to determine if projects would result in significant effects on species not listed by either the USFWS or CDFG (i.e., candidate species). Through this process, agencies are provided with the authority to protect additional species from the potential impacts of a project until the appropriate government agencies have an opportunity to designate the species as protected, if deemed appropriate.

WESTERN RIVERSIDE COUNTY MULTIPLE SPECIES HABITAT CONSERVATION PLAN

Adopted by the Riverside County Board of Supervisors on June 23, 2003, the Western Riverside County Multiple Species Habitat Conservation Plan (MSHCP) is a comprehensive habitat conservation planning program that addresses multiple species habitat needs and the preservation of native vegetation communities in Western Riverside County. The MSHCP contributes to preservation of regional biodiversity through coordination with other habitat conservation planning efforts throughout southern California. The MSHCP is intended to allow Western Riverside County and its Cities to maintain land use control and development flexibility, while addressing the requirements of the State and Federal Endangered Species Acts, by planning a regional preserve system that can meet future public and private project mitigation needs. The MSHCP does not impose major new restrictions on land use. Rather, the plan is designed to streamline and coordinate existing procedures for review and permitting of a project's impacts to biological resources. An overall goal of the MSHCP is to conserve native vegetation communities and associated species, rather than focusing preservation efforts on one species at a time.

The MSHCP Implementation Agreement (IA) lists the specific obligations required by the affected cities, in order to be active participants in the MSHCP implementation. One of those obligations includes amending General Plans to implement the requirements of the MSHCP for public and private development projects. Other obligations include the following:



1. City representation on the Western Riverside County Regional Conservation Authority (RCA) Board of Directors and Reserve Management Oversight Committee (MSHCP Sections 6.6.2 and 6.6.4);
2. Collect Local Development Mitigation Fees and Long-term Stephens' Kangaroo Rat Habitat Conservation Plan (SKR HCP) fees, and transmit to RCA quarterly (MSHCP Section 8.5), and Riverside County Habitat Conservation Agency (RCHCA) quarterly for SKR fees based on the Seventh Amendment to the RCHCA Joint Powers Agreement;
3. Meet the local Reserve Assembly contribution obligations through the Habitat Acquisition and Negotiation Strategy (HANS) for private development projects (MSHCP Section 6.1.1), for public projects at least 1:1 habitat mitigation ratio, and payment of Local Development Mitigation Fees for commercial and industrial development (MSHCP Section 7.0);
4. Comply with Joint Project Review process and annually transmit information on all projects within Criteria Cells (MSHCP 6.6.2);
5. Siting and Design Guidance and Best Management Practices for Covered Activities (MSHCP Section 7.0 and MSHCP Appendix C);
6. Riparian/Riverine and Fairy Shrimp Habitat (MSHCP Section 6.1.2), Narrow Endemic Plants (MSHCP Section 6.1.3), Criteria Area Survey Species (MSHCP Section 6.3.2), and Urban/Wildlands Interface Guidelines (MSHCP Section 6.1.4);
7. Enforce terms of project approvals for public and private projects using applicable land use permit enforcement procedures and practices to ensure compliance with MSHCP, Permits, and Implementation Agreement; and
8. Manage MSHCP Conservation Area property and conservation easements owned or leased by the City (MSHCP Sections 5.0 and 8.0).

The USFWS' and CDFG's approvals of the MSHCP and execution of the IA allows them to issue Take Authorizations to the IA signatories (including the City). In June 2004, the USFWS issued a Section 10(a)(1)(B) permit for the MSHCP. Additionally, the CDFG issued California Natural Community Conservation Plan Approval and Take Authorization for the MSHCP, as per California Fish and Game Code, Section 2800 et seq. The MSHCP would minimize and mitigate habitat loss and the incidental take of covered species in association with activities covered under the permit. Issuance of Take Authorization allows MSHCP participants to implement land use decisions consistent with the Plan without project-by-project review and permitting by the Wildlife Agencies, subject only to joint project review by the RCA to evaluate consistency with the MSHCP. A local, streamlined approach to planning for Endangered/Sensitive Species will provide for and maintain biological diversity by creating an interconnected MSHCP Conservation Area in the Plan Area. In addition to the preservation of species and associated



habitats, the MSHCP Conservation Area will provide open space and recreational opportunities, which will enhance the quality of life in Riverside County.

Under the MSHCP, local Permittees such as the City of Murrieta conduct covered activities consistent with the MSHCP, its associated IA, and Section 10(a)(1)(B) permit issued. The City approved the MSHCP on September 16, 2003 (Resolution No. 03-1245) and is a local Permittee under the MSHCP. As such, the City has the authority to meet the Federal and State endangered species and conservation planning obligations for its jurisdiction. Issuance of Take Authorization allows the City to implement land use decisions consistent with the MSHCP without project-by-project review and permitting by the Wildlife Agencies. The City of Murrieta Community Development Department is responsible for ensuring that all development proposed is consistent with the MSHCP Species Conservation Guidelines and Area Plan Conservation Criteria. The MSHCP, Permits, and IA serve as governing documents for the implementation of the conservation goals and land use planning parameters required by the local Permittees.

The Western Riverside County RCA, a joint powers authority, was established to assist the local Permittees with MSHCP implementation. The RCA is responsible for the administration of acquisitions and conservation easement dedication, land management, biological resource monitoring, and MSHCP fee collection and accounting.

Conceptual Reserve Design

The MSHCP is a Criteria-based plan that describes a MSHCP Conservation Area that will be assembled over time. For purposes of analysis and description, the MSHCP developed a Conceptual Reserve Design that envisions one of the ways in which the Additional Reserve Lands could be configured to be consistent with MSHCP objectives. *Exhibit 5.10-1, MSHCP Proposed and Existing Conservation Land*, illustrates the Conceptual Reserve Design, which is based on existing Conserved Lands, proposed “Core Areas” (undeveloped lands), and proposed “Linkages” (between Core Areas). The Conceptual Reserve Design forms the basis for the overall conservation and impact estimates for Covered Species under the MSHCP Plan (refer to the Planning and Covered Species Section below).

Existing Conserved Lands. Conserved Lands include Public/Quasi Public [PQP] Conserved Lands 2003 and Pre-Existing Conservation Agreements. As indicated in *Exhibit 5.10-1*, the City’s existing Conserved Lands are predominantly located east of I-215 and south of Clinton Keith Road. Additionally, some PQP Conserved Lands and Pre-Existing Conservation Agreements are located south of I-15, but predominantly within the City’s southern corner.

Proposed Core Areas. Core Areas involve a block of habitat of appropriate size, configuration, and vegetation characteristics to generally support the life history requirements of one or more Covered Species. The identified Core Areas include both existing PQP Lands and new areas.



Proposed Linkages. Linkages are a connection between Core Areas with adequate size, configuration, and vegetation characteristics to generally provide for "live-in" habitat¹ and/or provide for genetic flow for identified Planning Species. Linkages also provide movement habitat for a particular species. In contrast, movement corridors do not provide live-in habitat for species. Movement corridors are often linear and facilitate efficient movement by providing adequate cover and lack of physical obstacles for movement. Each habitat connection may be defined as a corridor or a Linkage for each species. Therefore, although areas in the MSHCP designated as Linkages may in fact function only as movement corridors for some species, for simplicity, connections between blocks of habitat are always referred to generally as Linkages. A Constrained Linkage is a constricted connection expected to provide for movement of identified Planning Species between Core Areas, where options for assembly of the connection are limited due to existing land use patterns.

Area Plans

In order to describe and implement the MSHCP's proposed conservation objectives efficiently, the Reserve Area is subdivided into ¼ quadrants (or 160-acre Cells), based on USGS topographic map sections. The Cells are grouped into Area Plans and Subunits for ease of discussion and planning. *Exhibit 5.10-2, MSHCP Area Plans and Subunits*, illustrates the boundaries of the MSHCP Area Plans and Subunits. As indicated in *Exhibit 5.10-2*, portions of the City/SOI are within the boundaries of the Southwest and Sun City/Menifee Area Plans, and include the following Subunits and Cells:

Southwest Area Plan (City Limits)

- Subunit SW1: Murrieta Creek Subunit;
- Subunit SW5: French Valley/Lower Sedco Hills Subunit;
- Subunit SW6: Santa Rosa Plateau Subunit (Cells 6658, 6659, 6779, 6780, and 6781).

Sun City/Menifee Area Plan (SOI)

- Subunit SCM1: Warm Springs Creek/French Valley Subunit (Cells 5066, 5163, 5167, and 5168).

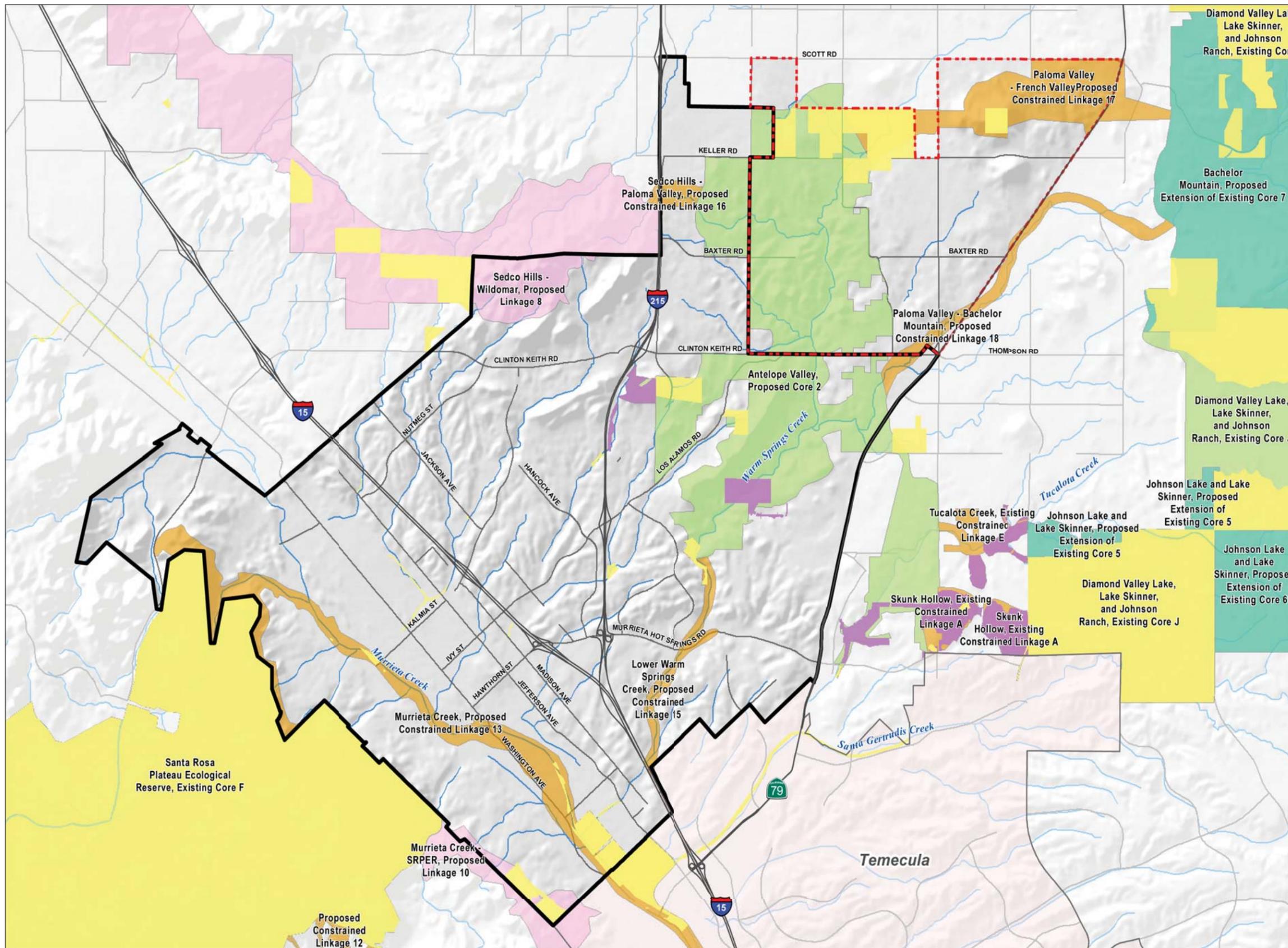
Conservation Goals

The Conservation Goals for the City/SOI focus on Proposed Linkages (i.e., Linkage and Constrained Linkage) and Proposed Cores (i.e., Core and Extension of Existing Core), as illustrated on *Exhibit 5.10-1* and outlined below:

Proposed Linkage

- 8: Sedco Hills/Wildomar.

¹ Live-In Habitat contains the necessary components to support key life history requirements of a species (e.g., year-round Habitat for permanent residents or breeding Habitat for migrant species).



LEGEND

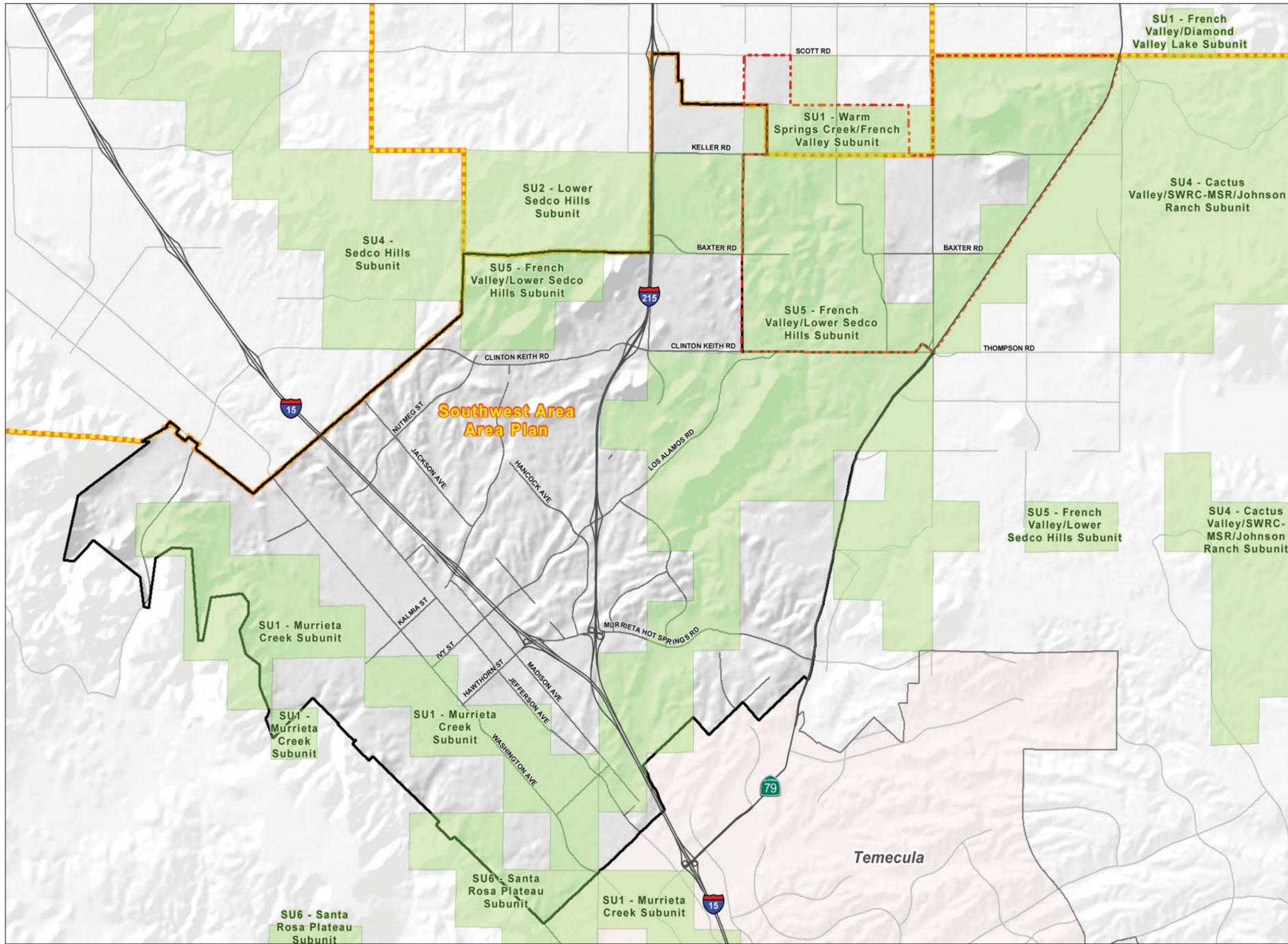
- Sphere of Influence
- City Boundary
- Conserved Lands**
 - PQP Conserved Lands (2003)
 - Pre-existing Conservation Agreements (2003)
- Proposed Linkages and Cores**
 - Constrained Linkage
 - Linkage
 - Core
 - Extension of Existing Core



Source: AirPhotoUSA, 2008; County of Riverside, 2006; and City of Murrieta, 2009.



Back of 11 x 17 Exhibit.



LEGEND

-  Sphere of Influence
-  City Boundary
-  Area Plan Boundary
-  Area Plan Sub Units



Source: AirPhotoUSA, 2008; County of Riverside, 2006; and City of Murrieta, 2009.



Back of 11 x 17 Exhibit.



Proposed Constrained Linkages

- 13: Murrieta Creek;
- 15: Lower Warm Springs Creek;
- 16: Sedco Hills-Paloma Valley;
- 17: Paloma Valley-French Valley;
- 18: Paloma Valley-Bachelor Mountain.

Proposed Core²

- 2: Antelope Valley.

Exhibit 5.10-2 illustrates the boundaries of the MSHCP Area Plans and Subunits, and indicates portions of the City/SOI are within the boundaries of the Southwest and Sun City/Menifee Area Plans, and include Subunits SW1, SW5, SW6, and SCM1. MSHCP Table 3-2, Target Acreage by Area Plan Subunit, for each Area Plan Subunit. As indicated in MSHCP Table 3-2, the target conservation range for Subunits SW1, SW5, and SW6 is between 6,285 and 11,775 acres. The target conservation range for Subunit SCM1 is between 395 and 565 acres. The target conservation range for lands within Subunits SW1, SW5, SW6, and SCM1 located within City limits is between 1,580 and 3,200 acres. The variable target acreage ranges are generally based on the difference between the area of the Criteria Area for the particular Subunit and the area of the Conceptual Reserve Design for the particular Subunit.

Biological Issues and Considerations

Biological Issues and Considerations for the Southwest (SW) and Sun City/Menifee (SCM) Area Plan Subunits within the City/SOI are:

- Murrieta Creek Subunit (SW1) and Santa Rosa Plateau (SW6): Maintain habitat function as riparian and aquatic species live-in habitat and large mammal movement linkage.
- French Valley/Lower Sedco Hills (SW5) and Warm Springs Creek/French Valley (SCM1): Maintain habitat Core for narrow endemic plants (saline/alkali and clay), Quino checkerspot butterfly, Riverside fairy shrimp, Los Angeles pocket mouse, western pond turtle, and habitat linkages through the City limits (east-west and north-south) for wildlife movement and plant dispersal.

Planning and Covered Species

Planning Species are identified, in order to provide guidance for Reserve Assembly in Cores and Linkages and/or Area Plans. The Planning Species considered for conservation during the MSHCP planning process are summarized in MSHCP Table 2-2 (Species Considered For Conservation Under The MSHCP Since 1999). “Covered Species” are those within the MSHCP

² There are no “Proposed Extension of Existing Core” identified within the City or the SOI.



Plan Area that will be conserved by the MSHCP when it is implemented. A total of 146 species addressed in the MSHCP are concluded to be Covered Species, as follows:

- 118 species are considered to be adequately conserved under the MSHCP. Among these are species for which surveys may be required. Specific survey requirements are included in the species-specific conservation objectives presented in MSHCP Sections 6.1.2, 6.1.3, 6.3.2, and 9.0.
- 28 species will be considered to be adequately conserved under the MSHCP when certain conservation requirements are met as identified in the species-specific conservation objectives for those species (refer to MSHCP Section 9.0);
 - 16 of the 28 species, require compliance with particular species-specific conservation objectives (refer to MSHCP Table 9-3), in order to shift those particular species to the list of Covered Species Adequately Conserved.
 - 12 of the 28 species, require that a Memorandum of Understanding be executed with the Forest Service that addresses management for these species on Forest Service Land, in order to shift these species to the list of Covered Species Adequately Conserved. A complete summary of MSHCP species survey requirements is provided in Appendix E to this document.

A Conservation Strategy was developed for each of the MSHCP's Covered Species. The Conservation Strategy for each species consists of four components: 1) A global biological goal; 2) a global biological objective; 3) species-specific biological objectives; and 4) management and monitoring activities. Covered species are further discussed in the Environmental Setting [Western Riverside County Multiple Species Habitat Conservation Plan] Section below.

MSHCP Implementation Structure

The MSHCP Implementation Structure is outlined in MSHCP Section 6.0 (Implementation Structure). The "Implementation Mechanism" selected by the Permittees (including Murrieta) is the legal mechanism to implement the terms of the MSHCP and the IA. The USFWS and CDFG Permits (USFWS Section 10(a)(1)(B) permit and CDFG Take Authorization) for the MSHCP became effective upon execution of the IA. Permittees' obligations to fully implement the terms and conditions of the MSHCP and the IA commence upon execution of the Implementation Mechanism. After adoption of the Implementation Mechanism, the Local Permittees will submit a copy of the appropriate documents to the RCA and the Wildlife Agencies.

As a Permittee City, Murrieta is required to adopt the following:

- An ordinance imposing the Local Development Mitigation Fee as analyzed in the MSHCP Nexus Fee Report. Ordinances shall be adopted in substantially the same form or at a minimum containing the same requirements as the MSHCP model ordinance.



- An ordinance or resolution that adopts the MSHCP and establishes procedures and requirements for the implementation of its terms and conditions. An ordinance or resolution shall be adopted in substantially the same form or at a minimum containing the same requirements as the MSHCP model ordinance or resolution. The ordinance or resolution shall contain, at a minimum, the following conditions:
 - Commitment to utilize the Habitat Evaluation and Acquisition Negotiation Strategy (HANS) or appropriate alternative method to ensure compliance with the Criteria.
 - Imposition of all other terms of the MSHCP, including but not limited to requirements concerning riparian/riverine areas and vernal pools, narrow endemic plant species, and appropriate surveys as set forth in MSHCP Sections 6.1.2, 6.1.3, and 6.3.2.
 - Agreement to enforce all other terms and conditions of the MSHCP, Implementing Agreement and the Permits.

In compliance with these requirements, the City of Murrieta has adopted Resolution 03-1245, Resolution Number 03-1246 (Western Riverside County MSHCP Implementation Policy), and Ordinance No. 289-03, which are discussed in the City of Murrieta MSHCP Resolutions/Ordinance Section below.

PROPERTY OWNER INITIATED HABITAT EVALUATION AND ACQUISITION NEGOTIATION STRATEGY (HANS)

Pursuant to MSHCP Section 6.1.1 (Property Owner Initiated Habitat Evaluation and Acquisition Negotiation Strategy (HANS)), the HANS process applies to property, which may be needed for inclusion in the MSHCP Conservation Area or subjected to other MSHCP Criteria. The Process is implemented by the County and those Cities that have agreed to implement the HANS process. The process is described as follows, pursuant to MSHCP Section 6.1.1.

Under the MSHCP, the Western Riverside County RCA, the County, Cities, or various State and Federal Agencies may obtain interests in property needed to implement the MSHCP over time. Interest may be obtained in fee, conservation easement, deed restriction, land exchange, flood control easement or other type of interest acceptable to the RCA, the County, Cities, acquiring State and/or Federal Agency, and property owner. As a property interest is obtained, it will become part of the MSHCP Conservation Area.

The establishment of Criteria Area boundaries is intended to facilitate the process by which the County or Cities evaluate property that may be needed for inclusion in the MSHCP Conservation Area. The Criteria Area, is an area significantly larger than what will be the MSHCP Conservation Area; refer to MSHCP Figure 3-1, MSHCP Plan Map. Property within the Criteria Area will be evaluated using MSHCP Conservation Criteria. The Criteria Area is an analytical tool which assists in determining which properties to evaluate for acquisition and conservation



under the MSHCP and does not impose land use restrictions. The Process ensures that an early determination will be made of what properties are needed for the MSHCP Conservation Area and that owners of land not needed for the MSHCP Conservation Area receive Take Authorization for Covered Species Adequately Conserved through the Permits issued to the County and Cities pursuant to the MSHCP.

Development of property outside of the MSHCP Conservation Area (both within and outside of the Criteria Area) receive Take Authorization for Covered Species Adequately Conserved provided payment of a mitigation fee is made (or any credit for land conveyed is obtained), as required by Murrieta's Local Development Mitigation Fee Ordinance, and compliance with MSHCP Section 6.0 (MSHCP Implementation Structure) occurs, as required by Murrieta's MSHCP Implementation Policy. Payment of the mitigation fee and compliance with the requirements of MSHCP Section 6.0 are intended to provide full mitigation under CEQA, NEPA, FESA, and CESA for impacts to the species and habitats covered by the MSHCP pursuant to agreements with the USFWS, CDFG, and/or any other appropriate participating regulatory agencies and as set forth in the MSHCP's IA. However, it is recognized that the MSHCP cannot provide mitigation for projects regulated by entities or agencies not participating in the MSHCP.

All proposed discretionary development projects within the Criteria Area would be subject to review under the HANS process and monitored through a uniform computerized tracking system. However, the issuance of a grading permit or site preparation permit for an individual single family home or mobile home on an existing legal lot shall not be subject to review under the HANS process but shall be subject to review under the procedures described in the Expedited Review Process for Single-Family Homes or Mobile Homes To Be Located on an Existing Lot Within the Criteria Area. This HANS process would not limit the County's or the Cities' ability to approve or deny a development application except that a project consistent with the HANS process may not be denied solely because a development application does not comply with the MSHCP Conservation Criteria.

PROTECTION OF SPECIES ASSOCIATED WITH RIPARIAN/RIVERINE AREAS AND VERNAL POOLS

MSHCP Section 6.1.2 describes the process through which protection of riparian/riverine areas and vernal pools would occur within the MSHCP Plan Area. Protection of riparian/riverine areas and vernal pools is important to conservation of the various species identified in MSHCP Section 6.1.2. The procedures outlined in this section are intended to ensure that the biological functions and values of these areas throughout the MSHCP Plan Area are maintained such that habitat values for species inside the MSHCP Conservation Area are maintained.

PROTECTION OF NARROW ENDEMIC PLANT SPECIES

As a Criteria-based plan, the MSHCP focuses on preserving individual species through conservation. Conservation is based on each species' particular habitat requirements, as well as



the known distribution data for each species. The existing MSHCP database does not, however, provide the level of detail sufficient to determine the extent of the presence or distribution of narrow endemic plant species within the MSHCP Plan Area. Narrow endemic plant species are highly restricted by their habitat affinities, edaphic requirements or other ecological factors, and for which specific conservation measures have been identified in MSHCP Section 6.1.3. Since conservation planning decisions for these species will have a substantial effect on the status of these species, additional information regarding the presence of these species is required during the long-term implementation of the MSHCP, in order to ensure that appropriate conservation of these species occurs. MSHCP Section 6.1.3 identifies the narrow endemic plant species for the MSHCP and the procedures necessary to ensure that the biological functions and values of these areas throughout the MSHCP Plan Area are maintained such that habitat values for species inside the MSHCP Conservation Area are maintained. These procedures address the following requirements:

- Survey, Mapping and Documentation Requirements;
- Avoidance and Minimization;
- Determination of Biologically Equivalent or Superior Preservation;
- Relationship to Existing Wetland Regulations; and
- Additional Species Benefits.

ADDITIONAL SURVEY NEEDS AND PROCEDURES

Additional surveys may be needed for certain species in conjunction with implementation of the MSHCP, in order to achieve coverage for these species. MSHCP Section 6.3.2 (Additional Survey Needs and Procedures) discusses those additional survey needs and procedures.

HABITAT CONSERVATION PLAN FOR THE STEPHENS' KANGAROO RAT IN WESTERN RIVERSIDE COUNTY

Background

In October 1988 the Stephens' kangaroo rat (SKR) was listed as an endangered species by the United States Fish and Wildlife Service (USFWS). Under the Endangered Species Act (ESA), both the SKR and its habitat were protected from any type of disturbance resulting in "take" of the species. The net effect was to freeze new development on more than 22,000 acres throughout western Riverside County. At the time of listing very little was known about the animal, its geographical distribution, or its habitat needs.

In order to address severe economic impacts of the SKR listing, the Riverside County Habitat Conservation Agency (RCHCA) prepared a Short-Term Habitat Conservation Plan (HCP). This HCP, approved by the USFWS and CDFG in August 1990, was intended as an interim conservation program designed to afford protection to the SKR while a plan providing for the establishment of permanent preserves could be developed.



Stephens' Kangaroo Rat Habitat Conservation Plan (1996)

On behalf of its members, the Riverside County Habitat Conservation Agency (RCHCA) sought a permit from the U.S. Fish and Wildlife Service (USFWS) and an agreement with the California Department of Fish and Game (CDFG) which would authorize incidental and management take, respectively, of the Stephens' kangaroo rat (SKR), a species protected under both the California and federal Endangered Species Acts (ESA). Toward this objective, the RCHCA prepared a Habitat Conservation Plan (HCP) which describes the conservation, mitigation, and monitoring measures which will be implemented if the permit and agreement are approved by the USFWS and CDFG.

This HCP is intended to replace a SKR Short-Term HCP, which the RCHCA and its member agencies have been implementing since 1990. Under that plan the USFWS and CDFG authorized a limited amount of incidental take subject to conservation and mitigation actions designed to:

- Provide for interim protection of Study Areas in order to allow for their evaluation as potential SKR reserves;
- Ensure full mitigation for all SKR occupied habitat incidentally taken through acquisition of replacement habitat in Study Area locations approved by the USFWS;
- Allow time for the RCHCA to conduct biological research necessary to document the species' characteristics and identify factors essential to its continued existence in the HCP area;
- Design a regional reserve system adequate to ensure long-term SKR persistence in the plan area; and
- Establish reliable funding sources sufficient to implement all provisions of the HCP for which the RCHCA assumed financial responsibility.

With the HCP, RCHCA seeks to:

- Replace its existing authorizations for incidental take of SKR with a 30-year permit and agreement;
- Replace the conservation, mitigation, and monitoring measures established under the Short-Term plan with those described in this HCP; and
- Implement a conservation program for the SKR which will also provide the basis for a subsequent ecosystem based plan covering all sensitive habitat types and species in RCHCA jurisdictions.

The new permit and agreement would be valid for 30 years and would authorize incidental take of SKR on RCHCA member agency lands within the plan area mapped in the HCP (Figure S-1).



The HCP area covers 533,954 acres within RCHCA member jurisdictions, including approximately 30,000 acres of occupied SKR habitat (Table S-1).

CONSERVATION, MITIGATION, AND MONITORING MEASURES

To meet the requirements specified in the California and Federal ESA's for the incidental and management take authorizations it seeks, the RCHCA prepared this HCP which identifies how the impacts of SKR incidental take will be minimized, mitigated, and monitored, and the degree to which the species' persistence in the plan area will be ensured.

1. Establishment, Completion, Expansion, and Management of the Core Reserves

The establishment, completion, expansion, and management of the core reserves defined in Chapter 5. SKR Conservation and Mitigation Measures will be the primary means of mitigating the impacts of incidental take to SKR in the plan area. These conservation and management activities also will be the primary means of assuring that SKR will persist within the plan area.

Through its implementation of the Short-Term SKR plan the RCHCA has ensured the conservation of the vast majority of land contained within the core reserves defined in this HCP. In order of decreasing size, the seven core reserves established by this HCP are:

- Lake Skinner-Domenigoni Valley (13,158 acres);
- Lake Mathews-Estelle Mountain (11,243 acres);
- San Jacinto-Lake Perris (10,932 acres);
- Sycamore Canyon-March Air Force Base (2,502 acres);
- Steele Peak (1,753 acres);
- Potrero ACEC (995 acres); and
- Motte Rimrock (638 acres).

In the aggregate these core reserves encompass 41,221 acres, including 12,460 acres of SKR occupied habitat.

2. RCHCA Funding Commitments

In addition to the \$30 million expended to date by the RCHCA to implement the Short-Term HCP and develop this conservation plan, the agency will provide an additional \$11.7 million toward land acquisition, core reserve management, and administration activities necessary to implement this HCP. The implementation budget for the HCP are presented in Chapter 5, SKR Conservation and Mitigation Measures.

3. Monitoring of Compliance and Plan Effectiveness

The RCHCA will maintain responsibility for monitoring compliance with the terms and conditions of the permit and agreement. Additionally, with the assistance of the RMCC, the



RCHCA will evaluate the effectiveness of HCP conservation and mitigation measures, and submit annual reports concerning same to USFWS and CDFG.

Annual reports will be reviewed by USFWS and CDFG to assess the effectiveness of the HCP in ensuring SKR persistence in the plan area. If necessary, modifications to the HCP will be made to address problems identified in the annual reports.

4. Plan Implementation

All of the institutional arrangements necessary for plan implementation are presently in place or will be established through interagency and cooperative agreements. The RCHCA Joint Powers Agreement already vests sufficient authority in the agency to perform all tasks necessary to fulfill its commitments for HCP implementation. Implementation of this HCP will be governed by legal agreements executed among the RCHCA, its member agencies, USFWS, CDFG, BLM, U.S. Department of Interior, and the State of California Resources Agency. The purpose of such agreements is to specify the terms and conditions under which the HCP will be implemented, and define the roles and responsibilities of all parties. The RCHCA and its member agencies will execute a combined Implementation Agreement/California Endangered Species Permit agreement with the aforementioned Federal and State agencies.

The City of Murrieta joined the Riverside County Habitat Conservation Agency Joint Exercise Powers Agreement on August 1, 1995.

IMPLEMENTATION AGREEMENT, RIVERSIDE COUNTY, LONG TERM CONSERVATION PLAN

The Agreement was made and entered into on April 23, 1996 by and among the United States Department of Interior, the United States Fish and Wildlife Service, the United States Bureau of Land Management, The Resources Agency of the State of California, the California Department of Fish and Game, the Riverside County Habitat Conservation Agency, the County of Riverside, and the cities of Corona, Hemet, Lake Elsinore, Moreno Valley, Murrieta, Perris, Riverside, and Temecula, all of which are located within the County of Riverside.

CITY OF MURRIETA DEVELOPMENT CODE – TREE PRESERVATION

Murrieta Development Code (MDC) Chapter 16.42, Tree Preservation, provides regulations for the protection, preservation, and maintenance of native Oak, Sycamore, and Cottonwood trees, trees of historic or cultural significance, groves and stands of mature trees, and mature trees in general, that are associated with proposals for development. These provisions are also intended to perpetuate these trees through the replacement of trees removed as a result of a new development. Pursuant to *MDC Chapter 16.42*, a protected tree includes any of the following:



- A. Native Oak with a diameter at breast height of four inches or greater. Smaller trees may also be protected under special circumstances as determined by the Director;
- B. Trees of historical or cultural significance as identified by Council resolution;
- C. Significant groves or stands of trees;
- D. Mature trees located on a parcel of one acre or more. Smaller trees may also be protected under special circumstances as determined by the Director; or,
- E. Any tree required to be planted or preserved as environmental mitigation for a discretionary permit.

No person is allowed to remove, cut down, or otherwise destroy a protected tree, unless a Tree Removal Permit has been approved by the Director of the Department of Planning. All development projects within the City are required to recognize through project design the desirability of preserving protected trees to the greatest extent feasible. The design of proposed grading and other improvements shall also reflect certain measures such as providing sufficient growing areas, minimizing disruption or removal of root zones, fencing of trees at or beyond the drip line during grading and construction, and minimizing all cutting, filling, or compaction of soils within the drip line, among other measures.

CITY OF MURRIETA MSHCP RESOLUTIONS/ORDINANCE

RESOLUTION NUMBER 03-1245

Resolution Number 03-1245 makes responsible agency findings pursuant to CEQA for the MSHCP/NCCP and approves the Western Riverside County MSHCP/NCCP and IA. Additionally, this Resolution adopts the environmental findings pursuant to CEQA and a Statement of Overriding Considerations.

RESOLUTION NUMBER 03-1246 (WESTERN RIVERSIDE COUNTY MULTIPLE SPECIES HABITAT CONSERVATION PLAN IMPLEMENTATION POLICY)

The Western Riverside County MSHCP Implementation Policy was adopted by the City on September 16, 2003, for the purpose of establishing procedures and requirements for implementation of the Western Riverside County MSHCP. Adoption and implementation of this Policy enables the City to achieve the conservation goals set forth in the Western Riverside County MSHCP, implement the associated IA, and preserve the ability of affected property owners to make reasonable use of their land consistent with NEPA, CEQA, FESA, CESA, NCCP Act, and other applicable laws.

The regulations specified in this Policy apply to all land within the City (with certain exceptions). Pursuant to Section V (Procedures) of this Resolution, the procedures for implementing the MSHCP are:



- A. The City shall implement the requirements for private and public project contributions to the MSHCP Conservation Area, as set forth in the MSHCP, through compliance with one of the following:
1. The City shall implement the Habitat Acquisition and Negotiation Strategy (HANS); or
 2. Upon receipt of a completed application for a project that is subject to this Resolution, or prior to the City's initiation of a project, the City shall determine whether all or a portion of the real property for the project is located within the boundaries of the Criteria Area. If the City determines that all or a portion of the real property for the project is located within the Criteria Area, then the City shall perform the following:
 - a. Determine the design criteria applicable to the project based on the particular USGS section, quadrant, and/or cell grouping in which the project property is located, as set forth in Section 3.2 of the MSHCP; and
 - b. Impose as a condition to the City's approval of the project such conditions as are necessary to ensure the project complies with and implements the design criteria applicable to the project.

Additionally, the City shall implement the requirements pertaining to the following:

- B. Protection of riparian/riverine areas and vernal pools as set forth in MSHCP Section 6.1.2;
- C. Protection of narrow endemic plant species as set forth in MSHCP Section 6.1.3;
- D. Conditions of Approval for the urban/wildlands interface guidelines as set forth in MSHCP Section 6.1.4;
- E. Conditions of Approval for surveys as set forth in MSHCP Section 6.3.2; and

City transfer of property.

ORDINANCE NUMBER 289-03 (LOCAL DEVELOPMENT MITIGATION FEE ORDINANCE)

The Local Development Mitigation Fee Ordinance establishes a mitigation fee for funding the preservation of natural ecosystems in accordance with the Western Riverside County MSHCP. Pursuant to Section 4 (Local Development Mitigation Fee) of this Ordinance, a local development mitigation fee shall be paid for each development project or portion thereof to be constructed within the City, as specified in this Ordinance.



5.10.2 ENVIRONMENTAL SETTING

Literature used to document the biological resources existing setting were the *Biological Resources Report* (LSA Associates, Inc., December 2009), the CDFG Natural Diversity Data Base (NDDDB) (2009a), the California Native Plant Society (CNPS) Electronic Inventory, the United States Department of Agriculture (USDA) Soil Survey, Western Riverside Area, California (Soil Conservation Service 1971), United States Geological Survey (USGS) topographic maps, California Water Quality Control Board hydrologic data, and the MSHCP (2003).

TOPOGRAPHY

The City is located in the southern tip of the Riverside Lowlands bioregion. The City is surrounded by three foothill ranges — Sedco Hills, Tocalota Hills (Bachelor Mountain), and Santa Rosa Plateau — and two drainage areas — Murrieta Creek and Warm Springs Creek. Elevation ranges from approximately 1,050 feet to 1,550 feet above mean sea level (amsl). The City is built on a series of plateaus, each raising the land elevation by roughly 100 feet starting from Murrieta Creek, stepping up at Interstate 15 (I-15), again at Murrieta Hot Springs Road, and finally at the Hogbacks. The “Hogbacks” is a small range of foothills situated south to north (one to two miles) with a 300-foot elevation gain above the valley floor.

SOILS

Two soil associations in Murrieta contain soil types of MSHCP importance: Cajalco-Temescal-Las Posas, underlying the northern portion of the City of Murrieta, east of the I-15; and Hanford-Tujunga-Greenfield, located along the I-15 corridor. Soils with a variety of properties have been identified in the MSHCP as indicative of rare or listed plant and wildlife species. These soils generally fall into three categories: saline-alkali, heavy clays, and vernal pool soils. Refer to Section 5.8, Geology and Seismic Hazards, for further discussion.

VEGETATION AND HABITATS

The vegetation types present in the City/SOI are illustrated in Exhibit 5.10-3, Vegetation and Land Use. The Wildlife Habitat Relationship (WHR) system of vegetation classification was used to map land cover and land use.³ As indicated Exhibit 5.10-3, the vegetation types present in the City/SOI include annual grassland, coastal scrub, chaparral, oak woodland, riparian, and wetlands.

Table 5.10-1, Existing Vegetation and Land Use in the City and Sphere of Influence, outlines more specific categories and acreages of the plant communities within the City/SOI.

³ The WHR is a standardized habitat classification scheme for California containing 59 habitats, structural stages for most habitats, and 124 special habitat elements.



Approximately 8,374 acres of undeveloped land with potential wildlife habitat (excludes agricultural lands) are present within the City/SOI.

Annual Grassland. Introduced annual grasses are dominant plant species in this habitat. These include wild oats, soft chess, rip-gut brome, red brome, and foxtail fescue. Many wildlife species use annual grasslands for foraging along with other habitat features necessary for nesting or roosting or escape cover. Species commonly found in this habitat are western fence lizard, garter snake, western rattlesnake, black-tailed jackrabbit, California ground squirrel, Botta’s pocket gopher, coyote, burrowing owl, horned lark, turkey vulture, kestrel, and red-tailed hawk.

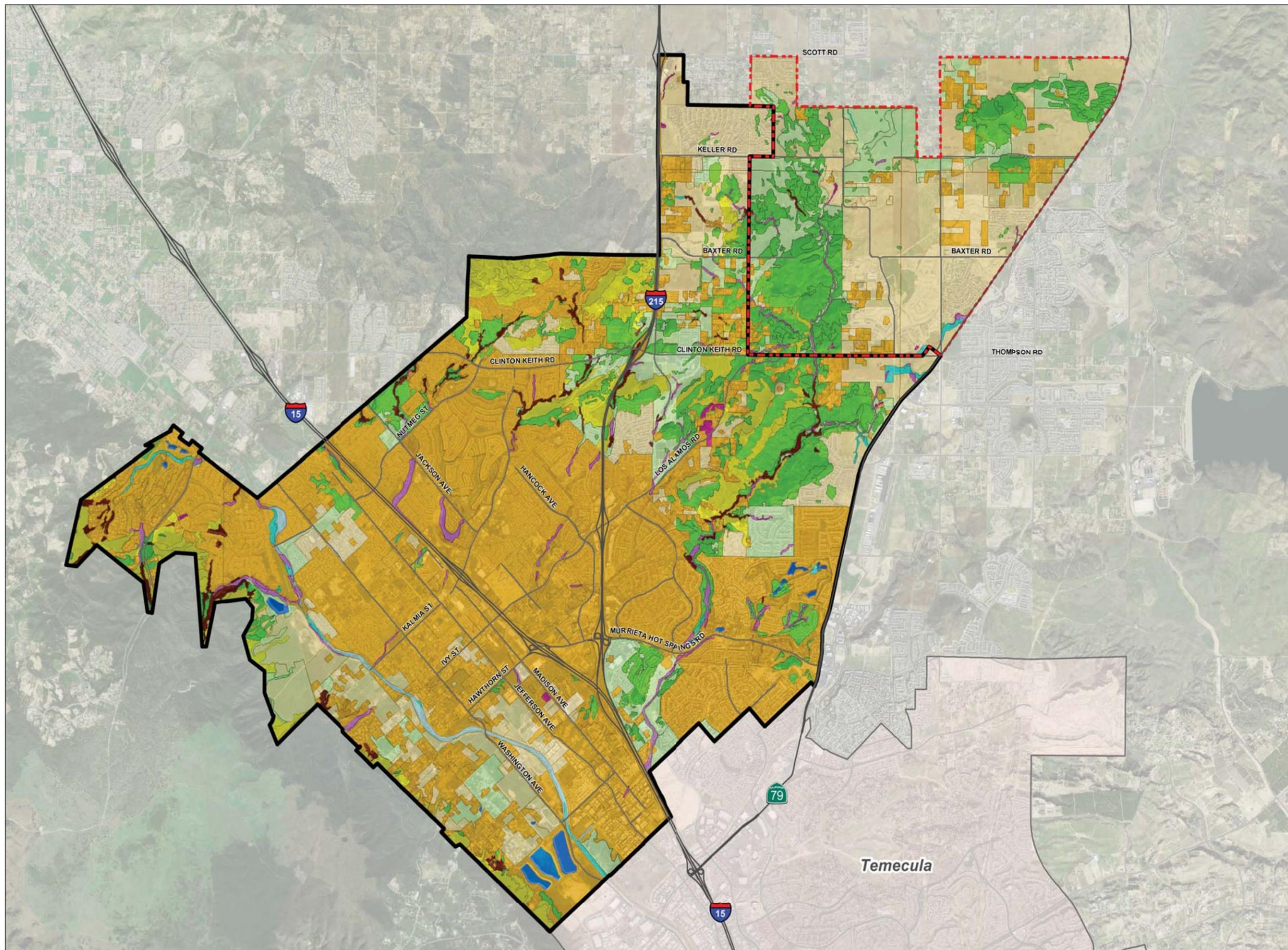
**Table 5.10-1
Existing Vegetation and Land Use in the City and Sphere of Influence**

Wildlife Habitat ¹	Wildlife Habitat Mapping Units (Common Name)	Approximate Area (acres)
Annual Grassland	California annual grassland alliance	2,340
Coastal Oak Woodland	Five different plant associations	303
Coastal Scrub	Sixteen different plant associations	3,372
Cropland, Orchard, Vineyard	Agricultural Land Use	5,662
Eucalyptus	Eucalyptus Alliance	35
Fresh Emergent Wetland	Bulrush-cattail	107
Lacustrine	Water mapping unit	128
Mixed Chaparral	Twelve different plant associations	1,636
Riverine/Lacustrine	Sandbars, mud flats, riparian shrubs and trees associated with a river	137
Urban	Five different mapping units	12,816
Valley Foothill Riparian	Nine different plant associations	316
TOTAL		26,852

1. Based on the Wildlife Habitat Relationship (WHR) system of vegetation classification.

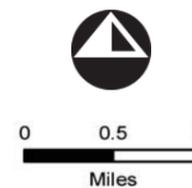
Coastal Oak Woodland. Oak woodlands can be deciduous and evergreen hardwoods, either dense with closed canopy or widely spaced in a savannah-like setting. Understory may be absent or may be dense coastal scrub and chaparral. Dominant species are Engelmann oak, coast live oak, interior live oak, and California walnut. Over 60 species of mammals and 110 bird species use oak habitats.

Coastal Scrub. Plant associations in coast scrub are of low to moderately sized shrubs with semi-woody stems, woody bases, and shallow root systems known to grow in a moderate moisture climate. Species composition, diversity, and density vary greatly with change in geographic location. California sage brush, California buckwheat, deerweed, brittlebush, black sage, and white sage are common coastal scrub species in the City. The California gnatcatcher, a song bird federally listed as threatened, is found exclusively in coastal scrub habitat.



LEGEND

- Sphere of Influence
- City Boundary
- Vegetation and Land Use (2006)**
- Annual Grassland
- Coastal Oak Woodland
- Coastal Scrub
- Cropland, Orchard - Vineyard
- Eucalyptus
- Fresh Emergent Wetland
- Lacustrine
- Mixed Chaparral
- Riverine, Lacustrine
- Urban
- Valley Foothill Riparian



Source: AirPhotoUSA, 2008; County of Riverside, 2006; and City of Murrieta, 2009.



Back of 11 x 17 Exhibit.



Cropland, Orchard, Vineyard. Croplands in association with orchards and vineyards are established on the most fertile soils in California, which historically supported high wildlife diversity and abundance. Some wildlife species have adapted to agricultural activities, but may be considered agricultural pests, thus, their presence in agricultural areas can be managed to reduce loss of crop production.

Eucalyptus. Eucalyptus habitats are usually single species thickets, rows of individual trees, or stands of closed canopy mature trees. These trees provide roosting and nesting habitat for many raptors, such as red-tailed hawk and barn owls, along with crows and ravens. The eucalyptus groves also serve as resting places for migratory song birds, such as tanagers and orioles, and monarch roosting.

Fresh Emergent Wetland. An emergent wetland is dominated by erect perennial and herbaceous water-loving plants and one of the most productive wildlife habitats in California. Numerous bird species, reptiles, and amphibians use wetlands as their primary habitat.

Lacustrine. Lacustrine habitat is distinguished by the presence ponded water in depressions or dammed streambeds with standing water, either present year-round or intermittent and seasonal. Submerged, floating, or emergent vegetation would be present depending upon the depth of the water. Numerous mammals, birds, reptiles, amphibians, crustaceans, and insects use lakes and ponds for food, water, cover, and reproduction.

Mixed Chaparral. Chaparral is a homogenous brushland dominated by thick, stiff shrubs with evergreen leaves in a nearly impenetrable thicket. Chaparral habitat can have numerous species of woody plants. Chaparral supports many species known to occur in coastal shrub and forest habitats.

Riverine. This habitat is influenced by intermittent or perennial running water. The habitat includes open water, riffle-pool complexes, emergent water-loving plants, and adjacent riparian terrestrial habitat. Waterfowl, eagles, herons, swallows, and flycatchers forage in riverine habitat. Beavers occupy the streams within the City.

Urban. Vegetation in urban settings includes tree groves, street strips, shade trees, lawns, and shrubs. Other classifications can be trees in between buildings, parks, open spaces, and ornamental gardens. Common species are mockingbird, scrub jay, acorn woodpecker, house finch, black phoebe, raccoon, opossum, and striped skunk. Suburban areas with large tracts of adjacent natural vegetation have increased wildlife diversity due to readily available water from landscape irrigation.

Valley Foothill Riparian. This habitat is known for statuesque cottonwoods, sycamores, and willows with either open understory or with shade-tolerant herbaceous or shrub species. Riparian habitats provide food, water, migration and dispersal corridors, escape cover, thermal protection, and reproductive sites.



MSHCP PLANNING SPECIES

In order to describe and implement the MSHCP’s proposed conservation objectives efficiently, the Reserve Area’s Cells are grouped into Area Plans and Subunits. As indicated in *Exhibit 5.10-2*, portions of the City are within the boundaries of the Southwest Area Plan (Subunits SW1, SW5, and SW6) and portions of the SOI are within the boundaries of the Sun City/Menifee Area Plan (Subunit SCM1). The MSHCP identifies wildlife and plant species expected or known to occur within each Area Plan (Planning Species), in order to provide guidance for Conceptual Reserve Design. Planning Species include Listed species and species with specific habitat requirements. The Planning Species that are relevant to the City/SOI are outlined in *Table 5.10-2, Species of Importance in the City and Sphere of Influence (Western Riverside County MSHCP)*. It is noted that *Table 5.10-2* may also include species which are not Planning Species for the area in question, but which may have important or key populations located in the area. Of the 54 Planning Species known or expected to occur within the City/SOI, 27 are Special Status (Listed) Species and 27 are Non-Listed Species; refer also to the Special Status Plants, Wildlife, and Habitats Section below.

The MSHCP Conservation goals focus on species associated with unusual soil types such as heavy clays, strongly saline-alkali loams, and soils with impenetrable layer that provide conditions required to form vernal pools. Listed plant and wildlife species associated with specific soil types are Munz’s onion, San Diego ambrosia, spreading navarretia, California Orcutt grass, and Quino checkerspot butterfly. Coastal scrub and chaparral habitat areas are important for the Quino checkerspot butterfly and California gnatcatcher. Annual grassland and coastal scrub habitat is important to listed Stephens’ kangaroo rat. Riparian, lacustrine, and emergent wetland habitats are important to listed least Bell’s vireo and southwestern willow flycatcher.

**Table 5.10-2
Species of Importance in the City and Sphere of Influence
(Western Riverside County MSHCP)**

Species	Status	Habitat and Description	Activity Period
Plants			
<i>Allium munzii</i> Munz’s onion	US: FE CA: ST CNPS: 1B MSHCP: S	On clay soils in openings within coastal sage scrub, pinyon juniper woodland, and grassland; 300 to 1,070 meters (1,000 to 3,500 feet) elevation. Known only from western Riverside County in Temescal Canyon, Gavilan Plateau, Bachelor Mountain, and Skunk Hollow areas. Clay soils on mesic exposures or seasonally moist microsites in grassy openings of coastal sage scrub, chaparral, juniper woodland, or valley and foothill grassland.	Blooms April through May (Perennial bulb)



Table 5.10-2 [continued]
Species of Importance in the City and Sphere of Influence
(Western Riverside County MSHCP)

Species	Status	Habitat and Description	Activity Period
<i>Ambrosia pumila</i> San Diego ambrosia	US: FE CA: SP CNPS: 1B MSHCP: S	Occurs in open habitats, usually near drainages or vernal pools, usually in sandy loam or on clay (including upland clay slopes) from 20 to 487 meters (70 to 1,600 feet) elevation. Known from western Riverside and western San Diego Counties. Also occurs in Mexico. Open floodplain terraces on Garretson gravelly fine sandy loams, or in the watershed margins of vernal pools or alkali playas on Las Posas loam in close proximity to Willow silty alkaline soils. Occurs in sparse annual vegetation.	Generally non-flowering (perennial herb)
<i>Atriplex parishii</i> Parish's brittlescale	US: – CA: SP CNPS: 1B MSHCP: S	Alkali meadows, vernal pools, chenopod scrub, and playas. Usually on drying alkali flats with fine soils. In California, known from Riverside, San Diego, and Orange Counties. Also occurs in Mexico. Believed extirpated from Los Angeles and San Bernardino Counties. Domino, Willows, and Traver soils in alkali vernal pools, alkali annual grassland, alkali playa, and alkali scrub components of alkali vernal plains.	Blooms June through October (annual herb)
<i>Atriplex serenana</i> var. <i>davidsonii</i> Davidson's saltscale	US: – CA: SP CNPS: 1B MSHCP: S	Alkaline soils in scrub and herbaceous communities from 10 to 460 meters (30 to 1,500 feet) elevation. In California, known only from Los Angeles, Orange, Riverside, San Diego, San Luis Obispo, and Ventura Counties. Believed extirpated from Santa Barbara and perhaps Los Angeles Counties. Also occurs in Mexico. Domino, Willows, and Traver soils in alkali vernal pools, alkali annual grassland, alkali playa, and alkali scrub components of alkali vernal plains.	Blooms April through October (annual herb)
<i>Brodiaea filifolia</i> Thread-leaved brodiaea	US: FT CA: SE/1B MSHCP: S	Usually on clay or associated with vernal pools or alkaline flats; occasionally in vernal moist sites in fine soils (clay loam, silt loam, fine sandy loam, loam, loamy fine sand). Typically associated with needlegrass or alkali grassland or vernal pools. Below 860 meters (2,800 feet) elevation. Los Angeles, Orange, Riverside, San Bernardino and San Diego Counties.	Blooms March through June (Perennial corm)
<i>Brodiaea orcuttii</i> Orcutt's brodiaea	US: – CA: 1B MSHCP: C	Clay and some serpentine soils in grasslands near streams or vernal pools, also known from woodlands, chaparral, and conifer forest; sea level to 1,615 meters (5,300 feet) elevation; Orange, Riverside, and San Diego Counties, and Baja California.	May through July
<i>California macrophylla</i> (<i>Erodium macrophyllum</i>) Round-leaved filaree	US: – CA: SP CNPS: 1B MSHCP: S	Clay soils in woodland, scrub, and grassland communities from 15 to 1,200 meters (50 to 4,000 feet) elevation. Known from central and south coastal areas and the Central Valley in California. Also occurs in Oregon and Mexico. Clay soils in open cismontane woodland (e.g., oak, juniper woodlands) and valley and foothill grassland. The MSHCP account for this species states that it is restricted to “very friable clay soils. Within the City/SOI, two of the mapped localities occur on Bosanko clay soils” and that “this species tends to be associated primarily with wild oats (<i>Avena fatua</i>).”	Blooms March through May (annual herb)



**Table 5.10-2 [continued]
Species of Importance in the City and Sphere of Influence
(Western Riverside County MSHCP)**

Species	Status	Habitat and Description	Activity Period
<i>Centromadia pungens</i> ssp. <i>laevis</i> Smooth tarplant	US: – CA: SP CNPS: 1B MSHCP: S	Alkaline areas in chenopod scrub, meadows, playas, riparian woodland, valley and foothill grassland below 480 meters (1,600 feet) elevation. Known from Riverside and San Bernardino Counties, extirpated from San Diego County. Primarily alkaline soils in alkali scrub, alkali playas, riparian woodland, watercourses, and alkaline grasslands. The MSHCP account for this species states that “Suitable habitat for the smooth tarplant includes alkali scrub, alkali playas, and grasslands with alkaline affinities...smooth tarplant is restricted to clay and alkaline, silty-clay soils.”	Blooms April through November (annual herb)
<i>Chorizanthe polygonoides</i> var. <i>longispina</i> Long-spined spineflower	US: – CA: 1B MSHCP: C	Clay soils in chaparral, coastal scrub, meadows and seeps, valley and foothill grassland at 30 to 1,450 meters (100 to 4,800 feet) elevation. Occurs in Riverside and San Diego Counties.	April through July (annual herb)
<i>Dudleya multicaulis</i> Many-stemmed dudleya	US: – CA: SP CNPS: 1B MSHCP: S	Heavy, often clay soils or around granitic outcrops in chaparral, coastal sage scrub, and grassland below 790 meters (2,600 feet) elevation. Known only from Los Angeles, Orange, Riverside, San Bernardino, and San Diego Counties. Clay soils in barrens, rocky places, ridgelines, and thinly vegetated openings in chaparral, coastal sage scrub, and southern needlegrass grasslands. Visible population size varies considerably year-to-year depending on rainfall patterns. The MSHCP account for this species states that “Many-stemmed dudleya is associated with openings in chaparral, coastal sage scrub, and grasslands underlain by clay and cobbly clay soils of the following series: Altamont, Auld, Bosanko, Claypit, and Porterville.”	Blooms April through July (perennial herb)
<i>Eryngium aristulatum</i> var. <i>parishii</i> San Diego button-celery	US: FE CA: SE/1B MSHCP: C	Vernal pools at 15 to 620 meters (50 to 2,000 feet) elevation. In California, known only from Riverside and San Diego Counties.	April through June
<i>Harpagonella palmeri</i> Palmer’s grapplinghook	US: – CA: 4 MSHCP: C	Clay soils in openings in coastal sage scrub, juniper woodland, and grassland; below 830 meters (2,700 feet) elevation. In California, known only from Orange, Riverside, and San Diego Counties and the Channel Islands.	March through April
<i>Hordeum intercedens</i> Vernal barley	US: – CA: 3 MSHCP: C	Vernal pools and saline flats and depressions below 1,000 meters (3,300 feet) elevation. Known from many California Counties. Also occurs in Mexico.	March through June (annual herb)



Table 5.10-2 [continued]
Species of Importance in the City and Sphere of Influence
(Western Riverside County MSHCP)

Species	Status	Habitat and Description	Activity Period
<i>Juglans californica</i> var. <i>californica</i> Southern California black walnut	US: – CA: 4 MSHCP: C	A 15 to 30-foot tree with multiple trunks that produces small thick-shelled walnuts. Found growing near creeks and rivers.	(tree)
<i>Lasthenia glabrata</i> ssp. <i>coulteri</i> Coulter's goldfields	US: – CA: SP CNPS: 1B MSHCP: S	Usually alkaline soils in marshes, playas, vernal pools, and valley and foothill grassland below 1,400 meters (4,600 feet) elevation. Known from Colusa, Merced, Tulare, Orange, Riverside, Santa Barbara, San Diego, San Luis Obispo, and Ventura Counties. Believed extirpated from Kern, Los Angeles, and San Bernardino Counties. Also occurs in Mexico. Traver, Domino or (usually) Willows soils in alkali scrub, alkali playas, vernal pools, and alkali grasslands. The MSHCP account for this species states that "Coulter's goldfields is restricted to clay and alkaline, silty-clay soils."	Blooms February through June (annual herb)
<i>Lepechinia cardiophylla</i> Heart-leaved pitcher sage	US: – CA: 1B MSHCP: S	Closed cone coniferous forest, chaparral, cismontane woodland; 550 to 1,370 meters (1,800 to 4,500 feet) elevation; Santa Ana Mountains in Riverside and Orange Counties. Also reported from San Diego County and Baja California.	Blooms April through July (perennial herb)
<i>Limnanthes gracilis</i> ssp. <i>parishii</i> Parish's meadowfoam	US: – CA: SE/1B MSHCP: C	Seasonally wet meadows and edges of vernal pools and intermittent streams; 550 to 2,000 meters (1,800 to 6,600 feet) elevation. Known from Peninsular Ranges in Riverside and San Diego Counties.	April through June
<i>Myosurus minimus</i> ssp. <i>apus</i> Little mousetail	US: – CA: SP CNPS: 3 MSHCP: S	Alkaline areas in vernal pools at 20 to 640 meters (70 to 2,100 feet) elevation. Known only from the Central Valley of California and the coastal and inland areas of Southern California. Alkaline soils in vernal pools and vernal plains. The MSHCP account for this species states that "little mousetail is found in areas that have semiregular inundation."	Blooms March through June (annual herb)
<i>Navarretia fossalis</i> Spreading navarretia	US: FT CA: SP CNPS: 1B MSHCP: S	In vernal pools, playas, shallow freshwater marshes and similar sites at 30 to 1,310 meters (100 to 4,300 feet) elevation. In California, known only from Los Angeles, San Luis Obispo, Riverside, and San Diego Counties. Also occurs in Mexico. Alkaline soils and southern basaltic claypan in vernal pools. The MSHCP account for this species states that, in Riverside County, it "is found in southern basaltic claypan vernal pools at the Santa Rosa Plateau, and alkaline vernal pools as at Skunk Hollow and at Salt Creek west of Hemet."	Blooms April through June (annual herb)



**Table 5.10-2 [continued]
Species of Importance in the City and Sphere of Influence
(Western Riverside County MSHCP)**

Species	Status	Habitat and Description	Activity Period
<i>Navarretia prostrata</i> Prostrate navarretia	US: – CA: 1B MSHCP: S	Vernal pools, usually alkaline, from 15 to 700 meters (50 to 2,300 feet) elevation. Known only from Alameda, Los Angeles, Merced, Monterey, Orange, Riverside, San Benito, San Diego San Luis Obispo, and possibly San Bernardino Counties.	Blooms April through July (annual herb)
<i>Orcuttia californica</i> California Orcutt grass	US: FE CA: SE CNPS: 1B MSHCP: S	Vernal pools from 15 to 660 meters (50 to 2,200 feet) elevation. In California, known from Los Angeles, Ventura, Riverside, and San Diego Counties. Also occurs in Mexico.	Blooms April through August (annual grass)
<i>Phacelia stellaris</i> Brand's phacelia	US: – CA: 1B MSHCP: S	Sandy openings, sandy benches, dunes, sandy washes or river floodplains in coastal sage scrub at 5 to 400 meters (20 to 1,300 feet) elevation. In western Riverside County, this species appears to be restricted to sandy washes and benches in alluvial floodplains. In California, known only from Los Angeles (believed extirpated), Riverside and San Diego Counties.	Blooms March through June (annual herb)
<i>Quercus engelmannii</i> Engelmann oak	US: – CA: 4 MSHCP: C	Chaparral, woodland, and grassland, from 120 to 1,300 meters (400 to 4,300 feet) elevation. Known from Los Angeles, Orange, Riverside, and San Diego Counties and from northern Baja California.	Year-round
<i>Satureja chandleri</i> San Miguel savory	US: – CA: 1B MSHCP: S	Rocky areas in chaparral or oak woodland or at the margins these communities in coastal sage scrub or grassland, at 110 to 1,210 meters (400 to 4,000 feet) elevation. Prefers moist rocky canyons with trees or large shrubs. Known only from Orange, Riverside, and San Diego Counties, and Baja California, Mexico.	Blooms March through May (perennial herb)
<i>Trichocoronis wrightii</i> var. <i>wrightii</i> Wright's trichocoronis	US: – CA: SP CNPS: 2 MSHCP: S	Alkali meadows, river beds, vernal pools, and lakes at 5 to 435 meters (20 to 1,430 feet) elevation. In California, known from the Central Valley and Riverside County. Also occurs in Texas and Baja California. Alkali soils in alkali playa, alkali annual grassland, and alkali vernal pools. The MSHCP account for this species states that "Wright's trichocoronis is restricted to highly alkaline, silty-clay soils in association with Traver, Domino, and Willows soils..."	Blooms May through September (annual or perennial herb)
Invertebrates			
<i>Branchinecta lynchi</i> Vernal pool fairy shrimp	US: FT CA: SA MSHCP: S	Vernal pools and swales in grassland areas. Known from the Central Valley, the central coast and south coast mountains as far south as Ventura County, and from the Santa Rosa Plateau, Skunk Hollow, and the Stowe Road vernal pool near Salt Creek just west of Hemet in Riverside County.	Seasonally following rains; typically January through April



**Table 5.10-2 [continued]
Species of Importance in the City and Sphere of Influence
(Western Riverside County MSHCP)**

Species	Status	Habitat and Description	Activity Period
<i>Euphydryas editha quino</i> Quino checkerspot butterfly	US: FE CA: SA MSHCP: C	Meadows or openings within coastal sage scrub or chaparral below about 5,000 feet where food plants (<i>Plantago erecta</i> and/or <i>Orthocarpus purpurascens</i>) are present. Historically known from Santa Monica Mountains to northwest Baja California; currently known only from southwestern Riverside County, southern San Diego County, and northern Baja California.	January through late April
<i>Linderiella santarosae</i> Santa Rosa Plateau fairy shrimp	US: – CA: SA MSHCP: S	Southern basalt flow vernal pools with cool clear to milky waters that are moderately predictable and remain filled for extended periods of time. Known only from the Santa Rosa Plateau of western Riverside County.	Seasonally following rains; typically January through April
<i>Streptocephalus woottoni</i> Riverside fairy shrimp	US: FE CA: SA MSHCP: S	Warm-water vernal pools (i.e., large, deep pools that retain water into the warm season) with low to moderate dissolved solids, in annual grassland areas interspersed through chaparral or coastal sage scrub vegetation. Suitable habitat includes some artificially created or enhanced pools, such as some stock ponds, that have vernal pool like hydrology and vegetation. Known from areas within about 50 miles of the coast from Ventura County south to San Diego County and Baja California.	Seasonally following rains; typically January through April
Fish			
<i>Gila orcuttii</i> Arroyo chub	US: – CA: CSC MSHCP: C	Perennial streams or intermittent streams with permanent pools; slow water sections of streams with mud or sand substrates; spawning occurs in pools. Native to Los Angeles, San Gabriel, San Luis Rey, Santa Ana, and Santa Margarita River systems; introduced in Santa Ynez, Santa Maria, Cuyama, and Mojave River systems and smaller coastal streams.	Year-round
Amphibians			
<i>Rana draytonii</i> California red-legged frog	US: FT CA: CSC MSHCP: S	Streams with slow-moving water and deep pools; dense, shrubby riparian vegetation at pool edges. Foothills surrounding the Sacramento Valley and coastal streams from Marin County to northwestern Baja California; Believed to be extirpated between Los Angeles County and the Mexican border. Below about 1,000 feet elevation.	December through April
<i>Taricha torosa torosa</i> Coast Range newt	US: – CA: CSC MSHCP: C	Breeds in ponds, reservoirs, and slow-moving streams; uses nearby upland areas including grassland, chaparral, and woodland; coastal drainages from Mendocino County south to San Diego County, with populations from San Luis Obispo County south designated as sensitive.	October through May



**Table 5.10-2 [continued]
Species of Importance in the City and Sphere of Influence
(Western Riverside County MSHCP)**

Species	Status	Habitat and Description	Activity Period
Reptiles			
<i>Actinemys marmorata (pallida)</i> Western pond turtle	US: – CA: CSC MSHCP: C	Inhabits permanent or nearly permanent water below 1,830 meters (6,000 feet) from central California, west of the Sierra-Cascade crest south to north-western Baja California. Absent from desert regions, except in the Mojave Desert along the Mojave River and its tributaries. Requires basking sites such as partially submerged logs, rocks, or open mud banks.	Year-round with reduced activity November through March
Birds			
<i>Accipiter cooperii</i> (nesting) Cooper’s hawk	US: – CA: SA MSHCP: C	Forages in a wide range of habitats, but primarily in forests and woodlands. These include natural areas as well as human-created habitats such as plantations and ornamental trees in urban landscapes. Usually nests in tall trees (20–60 feet) in extensive forested areas (generally woodlots of 4–8 hectares with canopy closure of greater than 60%). Occasionally nests in isolated trees in more open areas.	Year-round
<i>Aimophila ruficeps canescens</i> Southern California rufous-crowned sparrow	US: – CA: SA MSHCP: C	Steep, rocky coastal sage scrub and open chaparral habitats, particularly scrubby areas mixed with grasslands. From Santa Barbara County to northwestern Baja California.	Year-round, diurnal activity
<i>Ammodramus savannarum</i> (nesting) Grasshopper sparrow	US: – CA: CSC MSHCP: P	Grasslands, agricultural fields, prairie, old fields, and open savanna. Uncommon and very local summer resident on grassy slopes and mesas west of the deserts. Only rarely in migration and in winter. Coastal Southern California.	Coastal: Year-round; only casually in migration elsewhere
<i>Amphispiza belli belli</i> Bell’s sage sparrow	US: – CA: CSC MSHCP: C	Occupies chaparral and coastal sage scrub from west central California to northwestern Baja California.	Year-round, diurnal activity
<i>Aquila chrysaetos</i> (nesting) Golden eagle	US: – CA: CSC/CFP MSHCP: C	Generally open country of the Temperate Zone worldwide. Nesting primarily in rugged mountainous country. Uncommon resident in Southern California.	Year-round diurnal



**Table 5.10-2 [continued]
Species of Importance in the City and Sphere of Influence
(Western Riverside County MSHCP)**

Species	Status	Habitat and Description	Activity Period
<i>Athene cunicularia</i> (burrow sites) Burrowing owl	US: – CA: CSC MSHCP: S	Open country in much of North and South America. Usually occupies ground squirrel burrows in open, dry grasslands, agricultural and range lands, railroad rights-of-way, and margins of highways, golf courses, and airports. Often utilizes man-made structures, such as earthen berms, cement culverts, cement, asphalt, rock, or wood debris piles. This species avoids thick, tall vegetation, brush, and trees, but may occur in areas where brush or tree cover is less than 30 percent.	Year-round
<i>Buteo swainsoni</i> (nesting) Swainson's hawk	US: – CA: ST MSHCP: C	Open desert, grassland, or cropland containing scattered, large trees or small groves. Breeds in stands with few trees in juniper-sage flats, riparian areas, and in oak savannah in the Central Valley. Forages in adjacent grasslands or suitable grain or alfalfa fields, or livestock pastures. Breeds and nests in western North America; winters in South America. Uncommon breeding resident and migrant in the Central Valley, Klamath Basin, Northeastern Plateau, Lassen Co., and Mojave Desert. Very limited breeding reported from Lanfair Valley, Owens Valley, Fish Lake Valley, and Antelope Valley. In southern California, now mostly limited to spring and fall transient. Formerly abundant in California with wider breeding range.	Spring and fall (in migration)
<i>Cathartes aura</i> (breeding) Turkey vulture	Not SA MSHCP: C	Roost communally. Nest on the ground or cliffs, caves or dead trees.	Year-round or Summer
<i>Dendroica petechia brewsteri</i> (nesting) California yellow warbler	US: – CA: CSC MSHCP: C	Riparian woodland while nesting in the western U.S. and northwestern Baja California; more widespread in brushy areas and woodlands during migration and winter, when occurring from western Mexico to northern South America. Migrants belonging to other subspecies are widespread and common.	Summer, winter, or year-round, depending on locale
<i>Elanus leucurus</i> (nesting) White-tailed kite	US: – CA: CFP MSHCP: C	Typically nests in riparian trees such as oaks, willows, and cottonwoods at low elevations. Forages in open country. Found in South America and in southern areas and along the western coast of North America.	Year-round
<i>Empidonax traillii eximius</i> Southwestern willow flycatcher	US: FE CA: SE MSHCP: S	Rare and local breeder in extensive riparian areas of dense willows or (rarely) tamarisk, usually with standing water, in the southwestern U.S. and northwestern Mexico. Winters in Central and South America.	May through September



**Table 5.10-2 [continued]
Species of Importance in the City and Sphere of Influence
(Western Riverside County MSHCP)**

Species	Status	Habitat and Description	Activity Period
<i>Eremophila alpestris actia</i> California horned lark	US: – CA: SA MSHCP: C	Open grasslands and fields, agricultural area, open montane grasslands. This subspecies is resident from northern Baja California northward throughout non-desert areas to Humboldt County, including the San Joaquin Valley and the western foothills of the Sierra Nevada (north to Calaveras County). Prefers bare ground such as plowed or fall-planted fields for nesting, but may also nest in marshy soil. During the breeding season, this is the only subspecies of horned lark in non-desert southern California; however, from September through April or early May, other subspecies visit the area.	Year-round interior (inland areas)
<i>Lanius ludovicianus</i> (nesting) Loggerhead shrike	US: – CA: CSC MSHCP: C	Prefers open habitats with scattered shrubs, trees, posts, fences, utility lines, or other perches. Inhabits open country with short vegetation, pastures, old orchards, cemeteries, golf courses, riparian areas, and open woodlands. Highest density occurs in open-canopied valley foothill hardwood, valley foothill hardwood-conifer, valley foothill riparian, pinyon-juniper, juniper, desert riparian, and Joshua tree habitats. Occurs only rarely in heavily urbanized areas, but often found in open cropland. Found in open country in much of North America.	Year-round
<i>Oreortyx pictus</i> Mountain quail	Not SA MSHCP: C		
<i>Polioptila californica californica</i> Coastal California gnatcatcher	US: FT CA: CSC MSHCP: C	Inhabits coastal sage scrub in low-lying foothills and valleys in cismontane southwestern California and Baja California.	Year-round
<i>Tachycineta bicolor</i> Tree swallow	US: – CA: – MSHCP: C	Riparian scrub, woodland and forest, water, oak woodlands and forest. Nests in older trees and snags.	Year-round
<i>Vireo bellii pusillus</i> Least Bell's vireo	US: FE CA: SE MSHCP: S	Riparian forests and willow thickets. The most critical structural component of least Bell's vireo habitat in California is a dense shrub layer 2 to 10 feet (0.6–3.0 meter) above ground. Nests from central California to northern Baja California. Winters in southern Baja California.	April through September



**Table 5.10-2 [continued]
Species of Importance in the City and Sphere of Influence
(Western Riverside County MSHCP)**

Species	Status	Habitat and Description	Activity Period
Mammals			
<i>Dipodomys stephensi</i> Stephens' kangaroo rat	US: FE CA: ST MSHCP: C	Found in plant communities transitional between grassland and coastal sage scrub, with perennial vegetation cover of less than 50%. Most commonly associated with <i>Artemesia tridentata</i> , <i>Eriogonum fasciculatum</i> , and <i>Erodium</i> . Requires well-drained soils with compaction characteristics suitable for burrow construction. Not found in soils that are highly rocky, less than 20 inches deep, or heavily alkaline or clay, or in areas exceeding 25% slope. Occurs only in western Riverside County, northern San Diego County, and extreme southern San Bernardino County, below 915 meters (3,000 feet) elevation. In northwestern Riverside County, known only from east of Interstate 15. Reaches its northwest limit in south Norco, southeast Riverside, and in the Reche Canyon area of Riverside and extreme southern San Bernardino Counties.	Year-round
<i>Lynx rufus</i> Bobcat	US: – CA: – MSHCP: C	Chaparral, coastal sage scrub, desert scrub, montane coniferous forest, riparian scrub, woodland and forest, Riversidean alluvial fan sage scrub	Year-round
<i>Perognathus longimembris brevinasus</i> Los Angeles pocket mouse	US: – CA: CSC MSHCP: S	Prefers sandy soil for burrowing, but has been found on gravel washes and stony soils. Found in coastal sage scrub in Los Angeles, Riverside, and San Bernardino Counties.	Nocturnal. Active late spring to early fall.
<i>Puma concolor</i> Mountain lion	Not SA except Yuma Mtn lion MSHCP: C		
<p>LEGEND</p> <p>US: Federal Classifications FE Taxa listed as Endangered. FT Taxa listed as Threatened.</p> <p>CA: State Classifications SE Taxa State-listed as Endangered. ST Taxa State-listed as Threatened. CSC California Species of Special Concern. Refers to animals with vulnerable or seriously declining populations. SA Special Animal. Refers to any other animal monitored by the Natural Diversity Data Base, regardless of its legal or protection status. SP Special Plant. Refers to any other plant monitored by the Natural Diversity Data Base, regardless of its legal or protection status.</p> <p>CNPS: California Native Plant Society Classifications 1B Plants considered by CNPS to be rare, threatened, or endangered in California and elsewhere. 2 Plants considered by CNPS to be rare, threatened, or endangered in California, but more common elsewhere. 3 Plants suggested by CNPS for consideration as endangered but about which more information is needed.</p>			



**Table 5.10-2 [continued]
Species of Importance in the City and Sphere of Influence
(Western Riverside County MSHCP)**

Species	Status	Habitat and Description	Activity Period
MSHCP: Western Riverside County MSHCP Status			
S		Species is adequately conserved under the MSHCP, but surveys are required within indicated habitats and/or survey areas.	
C		Species is adequately conserved under the MSHCP.	
P		Species is covered but not considered adequately conserved pending completion of MSHCP specified requirements.	

SPECIAL STATUS PLANTS, WILDLIFE, AND HABITATS

Special status species include those that are listed as rare, threatened, or endangered by either the CDFG or the USFWS; species that are candidates for either Federal or State listing; species designated as “fully protected” or “Species of Special Concern” by CDFG; and other species that are tracked by the California Natural Diversity Data Base, but that do not fall into any of the other categories mentioned above. The special status species discussed below are listed as Federal or State Endangered or Threatened or California Species of Special Concern. A total of 27 special status species (plants and wildlife) are known or expected to occur in the City/SOI.

Special Status Plant Species

The seven (7) special status plant species (i.e., Federal or State Endangered or Threatened or California Species of Special Concern) that are known or expected to occur within the City/SOI are outlined below. Their habitat and distribution are discussed in Table 5.10-2.

- Munz’s onion (*Allium munzii*);
- San Diego ambrosia (*Ambrosia pumila*);
- Thread-leaved brodiaea (*Brodiaea filifolia*);
- San Diego button-celery (*Eryngium aristulatum var. parishii*);
- Parish’s meadowfoam (*Limnanthes gracilis ssp. Parishii*);
- Spreading navarretia (*Navarretia fossalis*); and
- California Orcutt grass (*Orcuttia californica*).

Special Status Wildlife Species

The 20 special status wildlife species (i.e., Federal or State Endangered or Threatened or California Species of Special Concern) that are known or expected to occur within the City/SOI are outlined below. Their habitat and distribution are discussed in Table 5.10-2.



- Vernal Pool Fairy Shrimp (*Branchinecta lynchi*);
- Quino Checkerspot Butterfly (*Euphydryas editha quino*);
- Santa Rosa Plateau Fairy Shrimp (*Linderiella santarosae*);
- Riverside Fairy Shrimp (*Streptocephalus woottoni*);
- Arroyo Chub (*Gila orcuttii*);
- California Red-legged Frog (*Rana draytonii*);
- Coast Range Newt (*Taricha torosa torosa*);
- Western Pond Turtle (*Actinemys marmorata pallida*);
- Grasshopper Sparrow (*Ammodramus savannarum*);
- Bell's Sage Sparrow (*Amphispiza belli belli*);
- Golden Eagle (*Aquila chrysaetos*);
- Burrowing Owl (*Athene cunicularia*);
- Swainson's Hawk (*Buteo swainsoni*);
- California Yellow Warbler (*Dendroica petechia brewsteri*);
- Southwestern Willow Flycatcher (*Empidonax traillii extimus*);
- Loggerhead Shrike (*Lanius ludovicianus*);
- Coastal California Gnatcatcher (*Polioptila californica californica*);
- Least Bell's Vireo (*Vireo bellii pusillus*);
- Stephens' Kangaroo Rat (*Dipodomys stephensi*); and
- Los Angeles Pocket Mouse (*Perognathus longimembris brevinasus*).

Riparian and Wetland Habitats

The City/SOI lie within the inland portion of the Santa Margarita River Basin. Murrieta Creek and Temecula Creek are the main tributaries of the Santa Margarita River, and Warm Springs Creek is a tributary to Murrieta Creek. Both Murrieta Creek and Warm Springs Creek flow through the City/SOI.

Murrieta Creek flows southeasterly through the Murrieta Valley and is generally bounded by Warm Springs Creek to the east. Murrieta Creek occurs as a natural watercourse that runs from the northern City limit to the southern City limit near Cherry Street. Both creeks have highly variable flows and join Temecula Creek to the south of the City to form the Santa Margarita River, which ultimately drains into the Pacific Ocean near the southern boundary of Camp Pendleton. Both creeks generally remain in a semi-natural state with areas of significant native vegetation occurring along portions of each. Other minor tributaries and intermittent stream courses also occur throughout the City/SOI. As indicated in [Table 5.10-1](#), lacustrine, riverine, and riparian habitats are present in the City/SOI, among others.

Grasslands within the City/SOI have historically supported vernal pools and seasonal wetlands; however, as development has occurred over the years, much of this habitat has been lost.



Vernal pools are ephemeral wetlands that generally form within shallow depressions where substrate near the surface restricts the percolation of water. Standing rainwater within these depressions often occurs during the fall and winter seasons, which can remain inundated until spring or early summer. These depressions may fill and empty several times during the rainy season, depending on the amount and frequency of precipitation. Vernal pools often support a flowering community, dominated by characteristic wetland plants.

In addition to riparian areas, isolated seasonal wetlands generally occur in topographic depressions within grasslands where soils are sufficiently impermeable to pond water during the rainy season; however, seasonal wetlands differ from vernal pools in that they may not be inundated for as long as vernal pools and generally contain a greater abundance of facultative and grassy species, and few, if any vernal pool endemic species. The final determination of the type of wetland is often ultimately verified by the ACOE. The extent to which special-status plant and animal species utilize these habitats varies; however, any species present in vernal pools may also occupy seasonal wetlands. Both vernal pools and seasonal wetlands offer habitat for a variety of plant and animal species listed as threatened or endangered, or that have other special status that require some level of protection. Vernal pool crustaceans, such as vernal pool fairy shrimp and vernal pool tadpole shrimp, along with a variety of plant species, are characteristically present in vernal pools.

Critical Habitat

The term “critical habitat” applies to areas designated by the USFWS to be of biological importance to Federally-listed species. Critical habitat is represented by a specific geographic area that is considered to be essential for the conservation of a threatened or endangered species and, as such, may require special management and long-term protection. Areas that are not presently occupied by a Federally-listed species may be considered as critical habitat as such habitat may be necessary for the recovery of the species. An area is designated as “critical habitat” following publication of a proposed Federal regulation in the Federal Register and receipt and consideration of public comments on the proposal. The final boundaries of the critical habitat area are published in the Federal Register.

Federal agencies are required to consult with the USFWS on actions they carry out, fund, or authorize in order to ensure that such actions will not result in the destruction or adverse modification of established critical habitat. As such, areas designated as critical habitat are provided protection for the long-term conservation of the species; however, a critical habitat designation has no effect on actions where a Federal agency is not involved (i.e. federal funding or permitting).

There is no designated or proposed critical habitat within the City or the SOI.



5.10.3 SIGNIFICANCE THRESHOLD CRITERIA

The issues presented in the Initial Study Environmental Checklist (Appendix G of the *CEQA Guidelines*) have been utilized as thresholds of significance in this Section. Accordingly, biological resources impacts resulting from the implementation of the proposed General Plan 2035 may be considered significant if they would result in the following:

- 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 Game or U.S. Fish and Wildlife Services.
- Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, and regulations or by the California Department of Fish and Game or U.S. Fish and Wildlife Services.
- 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.
- Conflict with provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan.

CEQA Guidelines Section 15065(a), *Mandatory Findings of Significance*, states that a project may have a significant effect on the environment if it would have "... the potential to substantially degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, reduce the number or restrict the range of an endangered, rare or threatened species ..."

An evaluation of whether an impact on biological resources would be substantial must consider both the resource itself and how that resource fits into a regional or local context. Substantial impacts would be those that would substantially diminish, or result in the loss of, an important biological resource or those that would obviously conflict with local, State, or Federal resource conservation plans, goals, or regulations. Impacts are sometimes locally adverse but not significant because, although they would result in an adverse alteration of existing conditions,



they would not substantially diminish or result in the permanent loss of an important resource on a population- or region-wide basis.

CEQA Guidelines Section 15380, *Endangered, Rare or Threatened Species*, states that a lead agency can consider a non-listed species to be Rare, Threatened, or Endangered for the purposes of CEQA, if the species can be shown to meet the criteria in the definition of Rare, Threatened, or Endangered. For the purposes of this discussion, the current scientific knowledge on the population size and distribution for each special status species was considered according to the definitions for Rare, Threatened, and Endangered listed in CEQA Guidelines Section 15380.

Based on these standards, the effects of the proposed project have been categorized as either a “less than significant impact” or a “potentially significant impact.” Mitigation measures are recommended for potentially significant impacts. If a potentially significant impact cannot be reduced to a less than significant level through the application of mitigation, it is categorized as a significant unavoidable impact.

5.10.4 PROJECT IMPACTS AND MITIGATION MEASURES

SPECIAL STATUS SPECIES

- **IMPLEMENTATION OF THE PROPOSED GENERAL PLAN 2035 COULD HAVE AN ADVERSE EFFECT, EITHER DIRECTLY OR THROUGH HABITAT MODIFICATIONS, ON ANY SPECIES IDENTIFIED AS A CANDIDATE, SENSITIVE, OR SPECIAL STATUS SPECIES.**

Level of Significance Before Mitigation: Less Than Significant Impact.

Impact Analysis: Of the 54 Planning Species known or expected to occur within the City/SOI, 27 are Special Status Species (Listed) (i.e., Federal or State Endangered or Threatened or California Species of Special Concern) plant and wildlife species; refer to Table 5.10-2. More specifically, the following seven special status plant species are known or expected to occur within the City/SOI:

- Munz’s onion (*Allium munzii*);
- San Diego ambrosia (*Ambrosia pumila*);
- Thread-leaved brodiaea (*Brodiaea filifolia*);
- San Diego button-celery (*Eryngium aristulatum* var. *parishii*);
- Parish’s meadowfoam (*Limnanthes gracilis* ssp. *Parishii*);
- Spreading navarretia (*Navarretia fossalis*); and
- California Orcutt grass (*Orcuttia californica*).



Additionally, the following 20 special status wildlife species are known or expected to occur within the City/SOI:

- Vernal Pool Fairy Shrimp (*Branchinecta lynchi*);
- Quino Checkerspot Butterfly (*Euphydryas editha quino*);
- Santa Rosa Plateau Fairy Shrimp (*Linderiella santarosae*);
- Riverside Fairy Shrimp (*Streptocephalus woottoni*);
- Arroyo Chub (*Gila orcuttii*);
- California Red-legged Frog (*Rana draytonii*);
- Coast Range Newt (*Taricha torosa torosa*);
- Western Pond Turtle (*Actinemys marmorata pallida*);
- Grasshopper Sparrow (*Ammodramus savannarum*);
- Bell's Sage Sparrow (*Amphispiza belli belli*);
- Golden Eagle (*Aquila chrysaetos*);
- Burrowing Owl (*Athene cunicularia*);
- Swainson's Hawk (*Buteo swainsoni*);
- California Yellow Warbler (*Dendroica petechia brewsteri*);
- Southwestern Willow Flycatcher (*Empidonax traillii extimus*);
- Loggerhead Shrike (*Lanius ludovicianus*);
- Coastal California Gnatcatcher (*Polioptila californica californica*);
- Least Bell's Vireo (*Vireo bellii pusillus*);
- Stephens' Kangaroo Rat (*Dipodomys stephensi*); and
- Los Angeles Pocket Mouse (*Perognathus longimembris brevinasus*).

Coastal scrub and chaparral habitat areas are important for the Quino checkerspot butterfly and California gnatcatcher. Annual grassland and coastal scrub habitat is important to Stephens' kangaroo rat. Riparian, lacustrine, and emergent wetland habitats are important to listed least Bell's vireo and southwestern willow flycatcher.

Approximately 36 percent of the City (approximately 7,750 acres) is currently vacant. These vacant undeveloped lands may contain native habitat areas where special status plant or wildlife species are known or expected to occur. As discussed in detail in Section 3.0, Project Description, implementation of the proposed General Plan 2035 would result in the development of approximately 10,734 additional dwelling units (DU) and approximately 36.2 million additional square feet (SF) of non-residential uses. This future development is anticipated to occur on both vacant and underutilized land throughout the City. Future development on naturally vegetated vacant land within the City/SOI, both within and outside of the MSHCP Reserve Area, could significantly impact native habitat areas where sensitive plant and wildlife species exist. Additionally, future development may result in a "take" of one of the special status species. The most notable impact would involve the removal of sensitive vegetation communities and sensitive species for building pad development, and building and roadway construction.



Covered Species are those within the MSHCP Area that will be conserved by the MSHCP when it is implemented. All 54 Planning Species (Listed and Non-Listed) known or expected to occur in the City/SOI are adequately conserved under the MSHCP, as follows:

27 Special Status (Listed) Species

- 13 special status species listed as Federal or State Endangered or Threatened or California Species of Special Concern are adequately conserved under the MSHCP;
- 13 special status species listed as Federal or State Endangered or Threatened or California Species of Special Concern are adequately conserved under the MSHCP, but surveys are required within indicated habitats/survey areas; and
- 1 special status species (grasshopper sparrow (*Ammodramus savannarum*)) listed as California Species of Special Concern is covered but not considered adequately conserved pending completion of the MSHCP specified requirements.

27 Special Status (Non-Listed) Species

- 12 non-listed species are adequately conserved under the MSHCP; and
- 15 non-listed species are adequately conserved under the MSHCP, but surveys are required within indicated habitats/survey areas.

The MSHCP incorporates features that would minimize impacts to special status (Listed) Covered Species, as well as Non-Listed Covered Species, within the City/SOI, to the extent feasible. The direct and indirect impacts of Covered Activities on Non-Listed Covered Species would be the same as for Listed Covered Species. The MSHCP assembles a Reserve Area that incorporates substantial acreages of suitable habitat and known locations in a configuration that provides live-in and linkage habitat for a number of Listed and Non-Listed Covered Species. Portions of the MSHCP Reserve Area extend into the City/SOI, as illustrated on Exhibit 5.10-2. The Conceptual Conservation Scenario for the MSHCP Reserve Area is based on existing Conserved Lands, proposed Core Areas (undeveloped lands), and proposed Linkages (between Core Areas). Exhibit 5.10-1 illustrates the Proposed Linkages and Cores, which are the focus of the Conservation Goals for the City/SOI. These Proposed Linkages and Cores include existing and proposed Conserved Lands that would be permanently protected and managed in their natural state for the benefit of the Covered Species. The target conservation range for lands within Subunits SW1, SW5, SW6, and SCM1 located within City limits is between 1,580 and 3,200 acres.

Additionally, various Listed and Non-Listed Covered Species occurring outside of the MSHCP Conservation Area would be protected by certain MSHCP policies. Namely, MSHCP Section 6.1.3 identifies the narrow endemic plant species for the MSHCP and the procedures necessary to ensure that the biological functions and values of these areas throughout the entire MSHCP Plan Area are maintained, including outside of the Conservation Area. MSHCP Section 6.3.2 requires that additional surveys be conducted for certain species, pursuant to specified



procedures. Species detected during surveys would be conserved in accordance with the respective applicable policy.

The City of Murrieta approved the MSHCP and is a local Permittee under the MSHCP. The USFWS and CDFG issued take permits for the MSHCP. As such, the City has the authority to meet the Federal and State endangered species and conservation planning obligations for its jurisdiction. Future development would undergo environmental and design review on a project-by-project basis, in order to determine potential impacts to candidate, sensitive, and special status species, and verify compliance with the City's Western Riverside County MSHCP Implementation Policy, which establishes procedures and requirements for implementation of the Western Riverside County MSHCP. Through MSHCP Implementation Policy compliance review, the City would implement the requirements for private and public project contributions to the MSHCP Conservation Area, as set forth in the MSHCP, through the HANS process or by conducting a project-specific review that determines whether all or a portion of the real property for the project is located within the boundaries of the Criteria Area, then determining the applicable design criteria (pursuant to MSHCP Section 3.2) and imposing conditions of approval. Additionally, the City would implement the requirements pertaining to the following issues, in accordance with MSHCP Implementation Policy:

- Protection of riparian/riverine areas and vernal pools as set forth in MSHCP Section 6.1.2;
- Protection of narrow endemic plant species as set forth in MSHCP Section 6.1.3;
- Conditions of Approval for the urban/wildlands interface guidelines as set forth in MSHCP Section 6.1.4;
- Conditions of Approval for surveys as set forth in MSHCP Section 6.3.2; and
- City transfer of property.

Compliance with Murrieta's MSHCP Implementation Policy, which implements the Western Riverside County MSHCP, would ensure that an early determination is made of what properties are needed for the MSHCP Conservation Area and that owners of land outside of the MSHCP Conservation Area receive Take Authorization for Covered Species Adequately Conserved through the Permits issued to the City pursuant to the MSHCP. Development of property outside of the MSHCP Conservation Area (both within and outside of the Criteria Area) would receive Take Authorization for Covered Species Adequately Conserved provided payment of a mitigation fee is made (or any credit for land conveyed is obtained), as required by Murrieta's Local Development Mitigation Fee Ordinance, and compliance with MSHCP Section 6.0 (MSHCP Implementation Structure) occurs, as required by Murrieta's MSHCP Implementation Policy. Compliance with Murrieta's Local Development Mitigation Fee Ordinance (payment of the mitigation fee) and MSHCP Implementation Policy would provide full mitigation under CEQA, NEPA, FESA, and CESA for impacts to the species and habitats covered by the MSHCP pursuant to agreements with the USFWS and CDFG, and/or any other appropriate participating regulatory agencies and as set forth in the MSHCP's IA.



Moreover, in order to further minimize potential impacts to special status species and habitats, the proposed General Plan 2035 designates a substantial amount of open space, which would be preserved. Approximately 3,221 acres are designated Parks and Open Space, representing approximately 18 percent of the City; refer to *Table 3-4, General Plan 2035 Buildout*. The Parks and Open Space Land Use Designation is intended to provide for the preservation of natural open spaces and maintain natural resources, among other objectives. The Parks and Open Space designation includes lands that would remain undeveloped within the City's Planning Area. The Parks and Open Space designation is also consistent with the MDC OS (Open Space) District, which is applied to appropriate areas, in order to ensure the conservation and protection of natural resources, including open space areas.

Additionally, the proposed General Plan 2035 Land Use, Conservation, and Recreation and Open Space Elements, have established goals and policies that address potential impacts to candidate, sensitive, or special status species and their habitats. Namely, Land Use Element Goal LU-25 requires collaboration with Federal, State, County, and other regional agencies and authorities, such as the Western Riverside County MSHCP, to ensure compliance with existing and future legislation that affects the City of Murrieta. To this end, the proposed General Plan 2035 has established Policy LU-25.1, which requires the City to provide a strong role in the development of regional planning efforts by ensuring local land use issues are adequately addressed at the regional level. It is the City's goal (Conservation Element Goal CSV-8) to conserve biological resources through habitat preservation and restoration, in coordination with other regional efforts and in compliance with state and federal mandates. To this end, the proposed General Plan 2035 has established Policy CSV-8.1, in order to continue conservation of habitat areas and wildlife corridors under the MSHCP. Policy CSV-8.2 requires compliance with applicable policies and regulations of regional, State, and Federal agencies, in order to achieve common goals for preservation of habitat and the protection of threatened and endangered species. Policy CSV-8.4 requires that development projects be reviewed, in order to determine their impact on biological resources, and compliance with State and Federal regulations. Additionally, it is the City's goal (Recreation and Open Space Element Goal ROS-7) to plan open space areas, in order to protect, conserve, and utilize resources of unique character and value for the community. To this end, the proposed General Plan 2035 has established Policy ROS-7.1, which requires preservation and enhancement of open space resources in Murrieta. Additionally, Policy ROS-7.2 requires that open space be designated, in order to preserve habitat and scenic views of natural areas. All future development would be subject to compliance with the policies outlined below, in furtherance of these City goals.

In general, future development anticipated by the proposed General Plan 2035 would be subject to compliance with Murrieta's MSHCP Implementation Policy, the MSHCP, and the proposed General Plan 2035 goals and policies. Additionally, due to the conceptual nature of the future development, proposals would require individual assessments of potential project-specific impacts to biological resources, including impacts to candidate, sensitive, or special status species and their habitats. If necessary, project-specific mitigation would be recommended to reduce potential impacts to a less than significant level. Therefore, future development associated with implementation of the proposed General Plan 2035 is not anticipated to have a



substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species. A less than significant impact would occur in this regard.

Goals and Policies in the Proposed General Plan 2035:

LAND USE ELEMENT

Goal LU-22 Natural and visual resources are valued resources to maintain the rural character of the Los Alamos Hills.

Policies

LU-22.3 Encourage development that minimizes impacts to existing water courses, mature trees, and natural features as much as possible. In those cases that these areas/features are impacted, the final design should provide adequate mitigation on-site and/or in nearby areas.

LU-22.4 Encourage healthy and structurally sound, existing groves of eucalyptus and other mature non-native trees located west of Warm Springs Creek to be considered a visual asset to the area, and should be conserved and maintained to the maximum degree practicable.

Goal LU-25 Collaboration with Federal, State, County, and other regional agencies and authorities to ensure compliance with existing and future legislation that affects the City of Murrieta.

Policies

LU-25.1 Provide a strong role in the development of regional planning efforts by ensuring local land use issues are adequately addressed at the regional level.

CONSERVATION ELEMENT

Goal CSV-3 A community that participates in a multi-jurisdictional approach to protecting, maintaining, and improving water quality and the overall health of the watershed.

Policies

CSV-3.5 Seek opportunities to restore natural watershed function as an added benefit while mitigating environmental impacts.



Goal CSV-4 Restoration of the natural function and aesthetic value of creeks, while providing flood control measures and opportunities for recreation.

Policies

CSV-4.1 Prioritize creek preservation, restoration and/or mitigation banking along creeks as mitigation for environmental impacts.

CSV-4.3 Preserve Warm Springs Creek and Cole Creek as a wildlife corridor, while accommodating flood control measures and passive recreation.

CSV-4.4 Retain and restore natural drainage courses and their function where health and safety are not jeopardized.

CSV-4.5 Support efforts for restoration, flood control, and recreation along Murrieta Creek, in coordination with regional and federal plans.

CSV-4.6 Seek funds and provide support for creek restoration, maintenance and protection through grant and mitigation programs, development entitlements, and non-profit organizations.

Goal CSV-5 Hills and ridges are protected for their environmental and aesthetic values.

Policies

CSV-5.1 Promote compliance with hillside development standards and guidelines to maintain the natural character and the environmental and aesthetic values of sloped areas.

Goal CSV-8 Conservation of biological resources through habitat preservation and restoration, in coordination with other regional efforts and in compliance with state and federal mandates.

Policies

CSV-8.1 Facilitate the conservation of habitat areas and wildlife corridors under the Western Riverside Multiple Species Habitat Conservation Plan.

CSV-8.2 Comply with applicable policies and regulations of regional, State, and Federal agencies to achieve common goals for preservation of habitat and the protection of threatened and endangered species.

CSV-8.3 Work with public and private land owners to conserve biological resources.



- CSV-8.4 Review development projects to determine their impact on biological resources, and compliance with state and federal regulations.
- CSV-8.5 Address Western Riverside Multiple Species Habitat Conservation Plan policies to preserve jurisdictional, wetland, vernal pool and other areas whose hydrology supports habitat and species identified for conservation in the Plan.
- CSV-8.6 Address Western Riverside Multiple Species Habitat Conservation Plan policies for an urban interface, to reduce the impacts from toxics, light, noise, invasive plant species and domestic predators (pets).

RECREATION AND OPEN SPACE ELEMENT

Goal ROS-7 Open space areas are planned to protect, conserve, and utilize resources of unique character and value for the community.

Policies

- ROS-7.1 Preserve and enhance open space resources in Murrieta.
- ROS-7.2 Designate open space to preserve habitat and scenic views of natural areas.
- ROS-7.3 Seek opportunities to designate open space along waterways, while also providing for the development of trails.
- ROS-7.4 When possible, link open space and parks for the movement of wildlife and people.

Mitigation Measures: No mitigation measures beyond the goals and policies identified in the proposed General Plan 2035 are required.

Level of Significance After Mitigation: Not Applicable.

SENSITIVE VEGETATION COMMUNITIES

■ **IMPLEMENTATION OF THE PROPOSED GENERAL PLAN 2035 COULD HAVE AN ADVERSE EFFECT ON A SENSITIVE VEGETATION COMMUNITY, INCLUDING RIPARIAN HABITAT AND FEDERALLY PROTECTED WETLANDS.**

Level of Significance Before Mitigation: Less Than Significant Impact.



Impact Analysis: As indicated in *Table 5.10-1*, sensitive upland, forest, and wetland communities are known to occur throughout the City and the SOI. Sensitive upland communities include chaparral and coastal sage scrub, and forest communities include coastal oak woodland. Additionally, wetlands include fresh emergent wetland, lacustrine, chaparral, riverine/lacustrine, and valley foothill riparian. Future development on naturally vegetated vacant land within the City/SOI, both within and outside of the MSHCP Reserve Area, could significantly impact sensitive vegetation communities, including riparian habitat or federally protected wetlands.

The MSHCP incorporates features that would minimize impacts to the City/SOI's sensitive vegetation communities (i.e., riparian habitat or federally protected wetlands) within the Reserve Area. The MSHCP assembles a Reserve Area that incorporates substantial acreages of sensitive vegetation communities. Portions of the MSHCP Reserve Area extend into the City/SOI, as illustrated on *Exhibit 5.10-2*. The Proposed Linkages and Cores involve existing and proposed Conserved Lands that include sensitive vegetation communities that would be permanently protected and managed in their natural state. Additionally, the MSHCP includes adaptive management and monitoring. Impacts to sensitive vegetation communities outside of the Reserve Area are not considered significant, given the substantial presence of these communities within the MSHCP Conservation Area.

The City of Murrieta approved the MSHCP and is a local Permittee under the MSHCP. The USFWS and CDFG issued take permits for the MSHCP. As such, the City has the authority to meet the Federal and State endangered species and conservation planning obligations for its jurisdiction. Future development would undergo environmental and design review on a project-by-project basis, in order to determine potential impacts to sensitive vegetation communities, including riparian habitat or federally protected wetlands, and verify compliance with the City's Western Riverside County MSHCP Implementation Policy (which implements the MSHCP). Through Implementation Policy compliance review, the City would implement the requirements for private and public project contributions to the MSHCP Conservation Area through the HANS process or by conducting a project-specific review. Additionally, the City would implement the requirements pertaining to riparian/riverine and fairy shrimp habitat (MSHCP Section 6.1.2), which addresses mapping of riparian, riverine, vernal pools, and other potentially jurisdictional wetland areas as part of the CEQA review of applications for Covered Activities within the MSHCP Plan Area. MSHCP Section 6.1.2 calls for avoidance and minimization of impacts to wetland habitat throughout the MSHCP Area, pursuant to existing regulatory standards that call for conservation and mitigation of wetland functions and values. Compliance with Murrieta's MSHCP Implementation Policy, which implements the Western Riverside County MSHCP (including MSHCP Section 6.1.2), would reduce impacts to sensitive vegetation communities, including riparian habitats and federally protected wetlands.

Additionally, the proposed General Plan 2035 Conservation Element has established goals and policies that address potential impacts to riparian habits and wetlands. Namely, it is the City's goal (Conservation Element Goal CSV-8) to conserve biological resources through habitat preservation and restoration, in coordination with other regional efforts and in compliance with



State and Federal mandates. To this end, the proposed General Plan 2035 has established Policy CSV-8.5 to address Western Riverside County MSHCP policies to preserve jurisdictional, wetland, vernal pool, and other areas whose hydrology supports habitat and species identified for conservation in the Plan.

Overall, future development anticipated by the proposed General Plan 2035 would be subject to compliance with Murrieta's MSHCP Implementation Policy, the MSHCP, and the proposed General Plan 2035 goals and policies, in order to address potential impacts to sensitive vegetation communities, including riparian habitats and wetlands. Additionally, due to the conceptual nature of the future development, proposals would require individual assessments of potential project-specific impacts to biological resources, including impacts to sensitive vegetation communities, including, riparian habitats and federally protected wetlands. If necessary, project-specific mitigation would be recommended to reduce potential impacts to a less than significant level. Therefore, future development according to the proposed General Plan 2035 is not anticipated to have a substantial adverse effect on sensitive vegetation communities, including riparian habitat or federally protected wetlands. A less than significant impact would occur in this regard.

Goals and Policies in the Proposed General Plan 2035: Refer to the goals and policies referenced above in this Section 5.10.

Mitigation Measures: No mitigation measures beyond the goals and policies identified in the proposed General Plan 2035 are required.

Level of Significance After Mitigation: Not Applicable.

WILDLIFE MOVEMENT CORRIDORS

■ IMPLEMENTATION OF THE PROPOSED GENERAL PLAN 2035 COULD INTERFERE WITH AN ESTABLISHED WILDLIFE CORRIDOR.

Level of Significance Before Mitigation: Less Than Significant Impact.

Impact Analysis: Additionally, future development on naturally vegetated vacant land within the City/SOI could significantly impact wildlife movement corridors. However, as The MSHCP incorporates features that would minimize impacts to wildlife corridors, within the City/SOI. The MSHCP assembles a Reserve Area that incorporates substantial acreages in a configuration that provides live-in and linkage habitat. Portions of the MSHCP Reserve Area extend into the City/SOI, as illustrated on *Exhibit 5.10-2*. The Proposed Linkages and Cores involve existing and proposed Conserved Lands that provide wildlife corridors. Conservation of the Proposed Linkages would ensure both permanent resident "live-in" habitat, as well as movement habitat (i.e., movement corridors), are provided for a particular species.



It is noted, future development may result in the removal of mature trees that provide perching or nesting habitat for migratory birds and raptors, and may result in a “take”; refer to the Special Status Species Section.

The City of Murrieta approved the MSHCP and is a local Permittee under the MSHCP. As such, the City has the authority to meet the Federal and State conservation planning obligations for its jurisdiction. Future development would undergo environmental and design review on a project-by-project basis, in order to determine potential impacts to wildlife corridors and verify compliance with the City’s Western Riverside County MSHCP Implementation Policy, which implements the MSHCP. Through MSHCP Implementation Policy compliance review, the City would implement the requirements for private and public project contributions to the MSHCP Conservation Area, as set forth in the MSHCP, through the HANS process or by conducting a project-specific review.

Additionally, the proposed General Plan 2035 designates a substantial amount of open space (approximately 3,221 acres), which would be preserved, thereby facilitating the movement of wildlife species through wildlife corridors. The proposed General Plan 2035 Conservation Element has established goals and policies that address potential impacts to wildlife corridors. Namely, it is the City’s goal (Conservation Element Goal CSV-4) to restore the natural function and aesthetic value of creeks, which serve as wildlife corridors. To this end, the proposed General Plan 2035 Policy CSV-4.1 requires creek preservation and restoration, and Policy CSV-4.3 requires that Warm Springs Creek and Cole Creek be preserved as wildlife corridors. It is the City’s goal (Goal CSV-8) to conserve biological resources through habitat preservation and restoration, in coordination with other regional efforts and in compliance with state and federal mandates. To this end, the proposed General Plan 2035 has established Policy CSV-8.1, in order to continue conservation of habitat areas and wildlife corridors under the MSHCP. Additionally, it is the City’s goal (Recreation and Open Space Element Goal ROS-7) to plan open space areas, in order to protect, conserve, and utilize resources of unique character and value for the community. To this end, the proposed General Plan 2035 has established Policy ROS-7.1, which requires preservation and enhancement of open space resources in Murrieta. Additionally, Policy ROS-7.2 requires that open space be designated, in order to preserve habitat and scenic views of natural areas. Policy ROS-7.4 requires that open space and parks be linked, when possible, for the movement of wildlife and people. All future development would be subject to compliance with the proposed General Plan 2035 policies, in furtherance of these City goals.

Future development anticipated by the proposed General Plan 2035 would be subject to compliance with Murrieta’s MSHCP Implementation Policy, the MSHCP, and the proposed General Plan 2035 goals and policies. Additionally, due to the conceptual nature of the future development, proposals would require individual assessments of potential project-specific impacts to biological resources, including impacts to an established wildlife corridor. Therefore, future development according to the General Plan 2035 is not anticipated to interfere substantially with an established wildlife corridor. A less than significant impact would occur in this regard.



Goals and Policies in the Proposed General Plan 2035: Refer to the goals and policies referenced above in this Section 5.10.

Mitigation Measures: No mitigation measures beyond the goals and policies identified in the proposed General Plan 2035 are required.

Level of Significance After Mitigation: Not Applicable.

LOCAL POLICY/ORDINANCE CONSISTENCY

■ IMPLEMENTATION OF THE PROPOSED GENERAL PLAN 2035 COULD CONFLICT WITH A LOCAL POLICY OR ORDINANCE PROTECTING BIOLOGICAL RESOURCES.

Level of Significance Before Mitigation: Less Than Significant Impact.

Impact Analysis: The City of Murrieta has adopted Resolution Number 03-1246 (Western Riverside County MSHCP Implementation Policy) and Ordinance Number 289-03 (Local Development Mitigation Fee), which are intended to protect biological resources in the City/SOI. The Western Riverside County MSHCP Implementation Policy was adopted by the City for the purpose of establishing procedures and requirements for implementation of the Western Riverside County MSHCP. The MSHCP is a comprehensive, multi-jurisdictional habitat conservation plan focusing on the conservation of species and their associated habitats in Western Riverside County. The Local Development Mitigation Fee Ordinance establishes a mitigation fee for funding the preservation of natural ecosystems in accordance with the Western Riverside County MSHCP. Future development would undergo environmental and design review on a project-by-project basis, in order to verify compliance with the City's Western Riverside County MSHCP Implementation Policy and Local Development Mitigation Fee Ordinance. Refer to the Western Riverside County MSHCP Consistency Section below, which addresses compliance with these regulations and the Western Riverside County MSHCP.

Future development would undergo environmental and design review on a project-by-project basis, in order to ensure compliance with the *Murrieta Development Code*, including Chapter 16.42, *Tree Preservation*. All development projects would be required to recognize through project design the preservation of protected trees to the greatest extent feasible. Compliance with *MDC* Chapter 16.42 would ensure protection, preservation, and maintenance of native Oak, Sycamore, and Cottonwood trees, groves and stands of mature trees, and mature trees in general, among others. Issuance of a Tree Removal Permit would be required, prior to removal of a protected tree.



Additionally, the proposed General Plan 2035 Conservation Element has established goals and policies in furtherance of tree preservation. Namely, it is the City’s goal (Conservation Element Goal CSV-9) to promote the growth of an urban forest, recognizing that plants provide natural services such as habitat. To this end, Policy CSV-9.1 requires that native trees, trees of historic or cultural significance, and mature trees, be identified and protected consistent with the Tree Preservation Ordinance. All future development would be subject to compliance with the proposed General Plan 2035 policies, in furtherance of this goal. Therefore, future development according to the proposed General Plan 2035 is not anticipated to conflict with *MDC* Chapter 16.42. A less than significant impact would occur in this regard.

Goals and Policies in the Proposed General Plan 2035: Refer to the goals and policies referenced above, along with the following goal and policy.

CONSERVATION ELEMENT

Goal CSV-9 A community that promotes the growth of an urban forest and water-efficient landscaping, recognizing that plants provide natural services such as habitat, storm water management, soil retention, air filtration, and cooling, and also have aesthetic and economic value.

Policies

CSV-9.1 Identify and protect native trees, trees of historic or cultural significance, and mature trees, consistent with the Tree Preservation Ordinance.

Mitigation Measures: No mitigation measures beyond the goals and policies identified in the proposed General Plan 2035 are required.

Level of Significance After Mitigation: Not Applicable.

WESTERN RIVERSIDE COUNTY MSHCP CONSISTENCY

■ **IMPLEMENTATION OF THE PROPOSED GENERAL PLAN 2035 COULD CONFLICT WITH THE PROVISIONS OF THE WESTERN RIVERSIDE COUNTY MSHCP.**

Level of Significance Before Mitigation: Less Than Significant Impact.

Impact Analysis:

MSHCP Implementation Structure. Portions of the MSHCP Reserve Area extend into the City/SOI; refer to Exhibit 5.10-2. The Reserve is intended to protect sensitive plant and wildlife species and their habitats pursuant to the Western Riverside County MSHCP. The MSHCP



Implementation Structure is outlined in MSHCP Section 6.0 (Implementation Structure). As a Permittee City, Murrieta is required to adopt an ordinance imposing the Local Development Mitigation Fee, and an ordinance/resolution that adopts the MSHCP and establishes procedures and requirements for its implementation.

In compliance with MSHCP Section 6.0, the City has adopted the Western Riverside County MSHCP Implementation Policy (Resolution Number 03-1246) and the Local Development Mitigation Fee Ordinance (Ordinance Number 289-03). The Western Riverside County MSHCP Implementation Policy establishes procedures and requirements for implementation of the Western Riverside County MSHCP. Adoption and implementation of this Policy enables the City to achieve the MSHCP Conservation Goals and implement the associated IA. This Policy also includes provisions for implementation of the HANS process and an alternative process that focuses on whether all or a portion of a property is located within the boundaries of the Criteria Area. Additionally, the City's MSHCP Implementation Policy (Sections V.A through V.F) addresses the requirements pertaining to protection of riparian/riverine areas and vernal pools, protection of narrow endemic plant species, urban/wildlands interface, conditions of approval for surveys, and City transfer of property.

Also in compliance with MSHCP Section 6.0, the City has adopted the Local Development Mitigation Fee Ordinance (Ordinance Number 289-03), which establishes a mitigation fee for funding the preservation of natural ecosystems in accordance with the Western Riverside County MSHCP.

MSHCP Conceptual Conservation Scenario. The Conceptual Conservation Scenario for the MSHCP Reserve Area is based on existing Conserved Lands, proposed Core Areas (undeveloped lands), and proposed Linkages (between Core Areas). *Exhibit 5.10-1* illustrates the Proposed Linkages and Cores, which are the focus of the Conservation Goals for the City/SOI. These Proposed Linkages and Cores include existing and proposed Conserved Lands that would be permanently protected and managed in their natural state for the benefit of the Covered Species.

The proposed General Plan 2035 has taken a focused development strategy that would be implemented through seven Focus Areas, with individualized approaches for each area. A review of *Exhibit 3-3, General Plan 2035 Focus Areas*, and *Exhibit 5.10-1*, indicates that future development within the proposed Focus Areas could involve the Proposed Linkages and Cores, as follows:

- North Murrieta Business Corridor Focus Area: May involve development within Antelope Valley Proposed Core 2 and Sedco Hills-Paloma Valley Proposed Constrained Linkage 16.
- South Murrieta Business Corridor Focus Area: May involve development within Murrieta Creek Proposed Constrained Linkage 13 and Lower Warm Springs Creek Proposed Constrained Linkage 15.



Given that development is also anticipated outside of the Focus Areas, future development may occur within the Proposed Linkages and Cores located elsewhere in the City.

The City of Murrieta approved the MSHCP and is a local Permittee under the MSHCP. As such, the City has the authority to meet the conservation planning obligations for its jurisdiction. Future development would undergo environmental and design review on a project-by-project basis, in order to confirm consistency with the City’s MSHCP Implementation Policy and the MSHCP Species Conservation Guidelines and Area Plan Conservation Criteria. The MSHCP, Permits, and Implementation Agreement would serve as guiding documents for implementation of the conservation goals and land use planning parameters required by the City.

It is noted, the MSHCP, while including a process for negotiation for potential acquisition of property for conservation, also anticipates the potential for project-specific parties to not come to an agreement through the HANS process. The MSHCP states “This HANS process will not be construed as a limitation on the County’s or the Cities’ ability to approve or deny a development application except that a project consistent with this HANS process may not be denied solely because a development application does not comply with the MSHCP Conservation Criteria.” This is evidenced in the MSHCP’s approach, which identifies a Conceptual Conservation Scenario and identifies a target acreage range, rather than precise acreage, for each Area Plan Subunit. More specifically, the target conservation range for lands within Subunits SW1, SW5, SW6, and SCM1 located within City limits is between 1,580 and 3,200 acres. Therefore, although acquisition may not be achieved through the HANS process, compliance with the HANS process would ensure compliance with the MSHCP.

Additionally, the proposed General Plan 2035 Conservation Element has established goals and policies that address compliance with the *Western Riverside County MSHCP*. It is the City’s goal (Conservation Element Goal CSV-8) to conserve biological resources through habitat preservation and restoration, in coordination with other regional efforts and in compliance with State and Federal mandates. To this end, the proposed General Plan 2035 has established Policy CSV-8.1, in order to continue conservation of habitat areas and wildlife corridors under the MSHCP. Policy CSV-8.2 requires compliance with applicable policies and regulations of regional, State, and Federal agencies, in order to achieve common goals for preservation of habitat and the protection of threatened and endangered species. In addition, Policies CSV-8.5 and CSV-8.6 address the MSHCP regarding the preservation of jurisdictional waters and other resources, and the reduction of impacts at the urban interface. All future development would be subject to compliance with the policies outlined below, in furtherance of these City goals. Therefore, future development according to the proposed General Plan 2035 is not anticipated to conflict with the provisions of the Western Riverside County MSHCP. A less than significant impact would occur in this regard.

Goals and Policies in the Proposed General Plan 2035: Refer to the goals and policies referenced above in this Section 5.10.



Mitigation Measures: No mitigation measures beyond the goals and policies identified in the proposed General Plan 2035 are required.

Level of Significance After Mitigation: Not Applicable.

5.10.5 CUMULATIVE IMPACTS AND MITIGATION MEASURES

- **DEVELOPMENT ASSOCIATED WITH IMPLEMENTATION OF THE PROPOSED PROJECT AND CUMULATIVE DEVELOPMENT COULD RESULT IN CUMULATIVELY CONSIDERABLE IMPACTS TO BIOLOGICAL RESOURCES.**

Level of Significance Before Mitigation: Less Than Significant Impact.

Impact Analysis: Cumulative biological impacts are primarily analyzed in terms of consistency with the *Western Riverside County MSHCP*. The MSHCP is a comprehensive, multi-jurisdictional habitat conservation plan focusing on the conservation of species and their associated habitats in Western Riverside County. The MSHCP is intended to allow Western Riverside County and its Cities to better control local land-use decisions while addressing the requirements of the State and Federal Endangered Species Acts. The MSHCP encompasses approximately 1.26 million acres, and includes all unincorporated Riverside County land west of the crest of the San Jacinto Mountains to the Orange County line, as well as the jurisdictional areas of the Cities of Temecula, Murrieta, Lake Elsinore, Canyon Lake, Norco, Corona, Riverside, Moreno Valley, Banning, Beaumont, Calimesa, Perris, Hemet, and San Jacinto.

The MSHCP Conceptual Reserve Design is based on existing Conserved Lands, proposed Core Areas (undeveloped lands), and proposed Linkages (between Core Areas). The Conceptual Reserve Design forms the basis for the overall conservation and impact estimates for Covered Species under the MSHCP Plan. MSHCP Figure 3-2, Schematic Cores and Linkages, illustrates Western Riverside County's existing Conserved Lands, Proposed Cores, and Proposed Linkages. In order to describe and implement the MSHCP's proposed conservation objectives efficiently, the Reserve Area is subdivided into Cells, which are grouped into Area Plans and Subunits for ease of discussion and planning. MSHCP Figure 3-3, Area Plans and Subunits, depicts the locations of the Area Plan Subunits within Western Riverside County. The Planning Species, and Biological Issues and Considerations for each Subunit are addressed individually for each Area Plan, in furtherance of the Plan's Conservation Goals.



As concluded above, implementation of the proposed General Plan 2035 would result in less than significant impacts involving the following issue areas: special status (listed) species; sensitive vegetation communities, including riparian habitat or federally protected wetlands; wildlife corridors; conflicts with local policies or ordinances protecting biological resources; and conflicts with the MSHCP. This analysis considered: listed, covered species; non-listed, covered species; and non-covered species, among other factors.

The MSHCP Final EIR/EIS analyzed the biological impacts resulting from implementation of the MSHCP for the following issue areas: vegetation communities; listed, covered species; non-listed, covered species; and non-covered species, among others. As outlined in EIR/EIS Table ES-8, the impact analysis concluded implementation of the MSHCP would result in less than significant impacts for the biological issue areas analyzed, except for the following significant and unavoidable impacts:

- Vegetation Community (Sensitive Upland: chaparral, coastal sage scrub, desert scrub, grasslands, Riversidean alluvial fan sage scrub); and
- Non-Covered Species.

City of Murrieta Resolution Number 03-1245 adopts the environmental findings pursuant to CEQA and a Statement of Overriding Considerations.

The biological impacts resulting from implementation of the proposed General Plan 2035 were considered in the MSHCP Final EIR/EIS analysis, since the MSHCP's approach identifies a Conceptual Conservation Scenario intended to accomplish the conservation goals for native vegetation communities and associated species. The MSHCP assembles a Reserve Area that incorporates substantial acreages of existing Conserved Lands, proposed Core Areas, and proposed Linkages. Moreover, the Conceptual Conservation Scenario identifies a target acreage range, rather than a precise acreage, for each Area Plan Subunit throughout MSHCP Area, including the City of Murrieta. The target conservation range for lands within Subunits SW1, SW5, SW6, and SCM1 located within City limits is between 1,580 and 3,200 acres. This target range was assumed for accomplishing the MSHCP's conservation goals. The General Plan 2035 is concluded to be consistent with the MSHCP, as discussed in the Western Riverside County MSHCP Consistency Section above. As such, impacts to biological resources, which are based on the conservation objectives, were anticipated in the MSHCP EIR/EIS. Implementation of the proposed General Plan 2035 project would be consistent with the analysis presented in the Final EIR/EIS, and would result in no greater impacts to biological resources than previously identified.

The cities within jurisdiction of the MSHCP, including the City of Murrieta, approved the MSHCP and are local Permittees under the MSHCP. The USFWS and CDFG issued take permits under the FESA and CESA. As such, the local Permittees (including the City of Murrieta) have the authority to meet the Federal and State endangered species and conservation planning obligations for their respective jurisdictions. The local Permittees, including the City of



Murrieta Department of Planning, would be responsible for ensuring that all development proposed within jurisdiction of the MSHCP is consistent with the MSHCP Species Conservation Guidelines and Area Plan Conservation Criteria. The MSHCP, Permits, and IA would serve as guiding documents for the implementation of the conservation goals and land use planning parameters required by the local Permittees.

All future development within Western Riverside County would undergo environmental and design review on a project-by-project basis, in order to evaluate potential impacts to biological resources and ensure consistency with the Western Riverside County MSHCP. Future development with potential to impact biological resources would also be required to comply with the established Federal and State regulatory framework. Biological impacts associated with implementation of the proposed General Plan 2035 would be less than significant by adherence to and/or compliance with goals and policies in the proposed General Plan 2035, and compliance with the Murrieta MSHCP Implementation Policy, and Western Riverside County MSHCP. Cumulative impacts to biological resources within Western Riverside County are currently being mitigated on a project-by-project basis and in accordance with the MSHCP, including through the HANS process. Therefore, implementation of the proposed General Plan 2035 would not result in cumulatively considerable impacts to biological resources.

Goals and Policies in the Proposed General Plan 2035: Refer to the goals and policies referenced above in this Section 5.10.

Mitigation Measures: No mitigation measures beyond the goals and policies identified in the proposed General Plan 2035 are required.

Level of Significance After Mitigation: Not Applicable.

5.10.6 SIGNIFICANT UNAVOIDABLE IMPACTS

Biological impacts associated with implementation of the proposed General Plan 2035 would be less than significant by adherence to and/or compliance with goals and policies in the proposed General Plan 2035, compliance with the City's MSHCP Implementation Policy, Local Development Mitigation Fee Ordinance, and Development Code, and the Western Riverside County MSHCP. No significant unavoidable impacts to biological resources would occur as a result of buildout of the proposed General Plan 2035.



5.10.7 SOURCES CITED

County of Riverside Transportation and Land Management Agency, and United States Fish and Wildlife Service, *Western Riverside County Multiple Species Habitat Conservation Plan (MSHCP) Final MSHCP Volume IV Final EIR/EIS*, June 17, 2003.

LSA Associates, Inc., *City of Murrieta General Plan Update Biological Resources*, December 2009.

Murrieta Development Code.

Western Riverside County Multiple Species Habitat Conservation Plan Official Website, <http://www.rctlma.org/mshcp/index.html>, Accessed January 17, 2010.