

**NESTING SEASON SURVEY  
BURROWING OWL**  
*(Athene cunicularia hypugaea)*

**TENTATIVE TRACT MAP 36644**

**APN 966-380-004**

**11.94-ACRE SITE; ±40 ACRES SURVEYED**

LOCATION:

North side of Anza Road, approximately 1,700 feet east of its intersection with El Chimisal Road, in unincorporated Riverside County, California (Rancho California). Portion of protracted Section 23, Township 8 South and Range 2 West of the USGS Topographic Map, 7.5 Minute Series, Pechanga, California Quadrangle

PREPARED FOR:

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SURVEYS CONDUCTED ON:

**July 29, August 5, August 12, and August 19, 2016**

REPORT DATE:

**August 24, 2016**

## INFORMATION SUMMARY

### REPORT DATE

August 24, 2016

### REPORT TITLE

Nesting Season Survey for the Burrowing Owl (*Athene cunicularia hypugaea*)

### CASE NUMBER

Tentative Tract Map 36644

### ASSESSOR'S PARCEL NUMBER

966-380-004

### SITE LOCATION

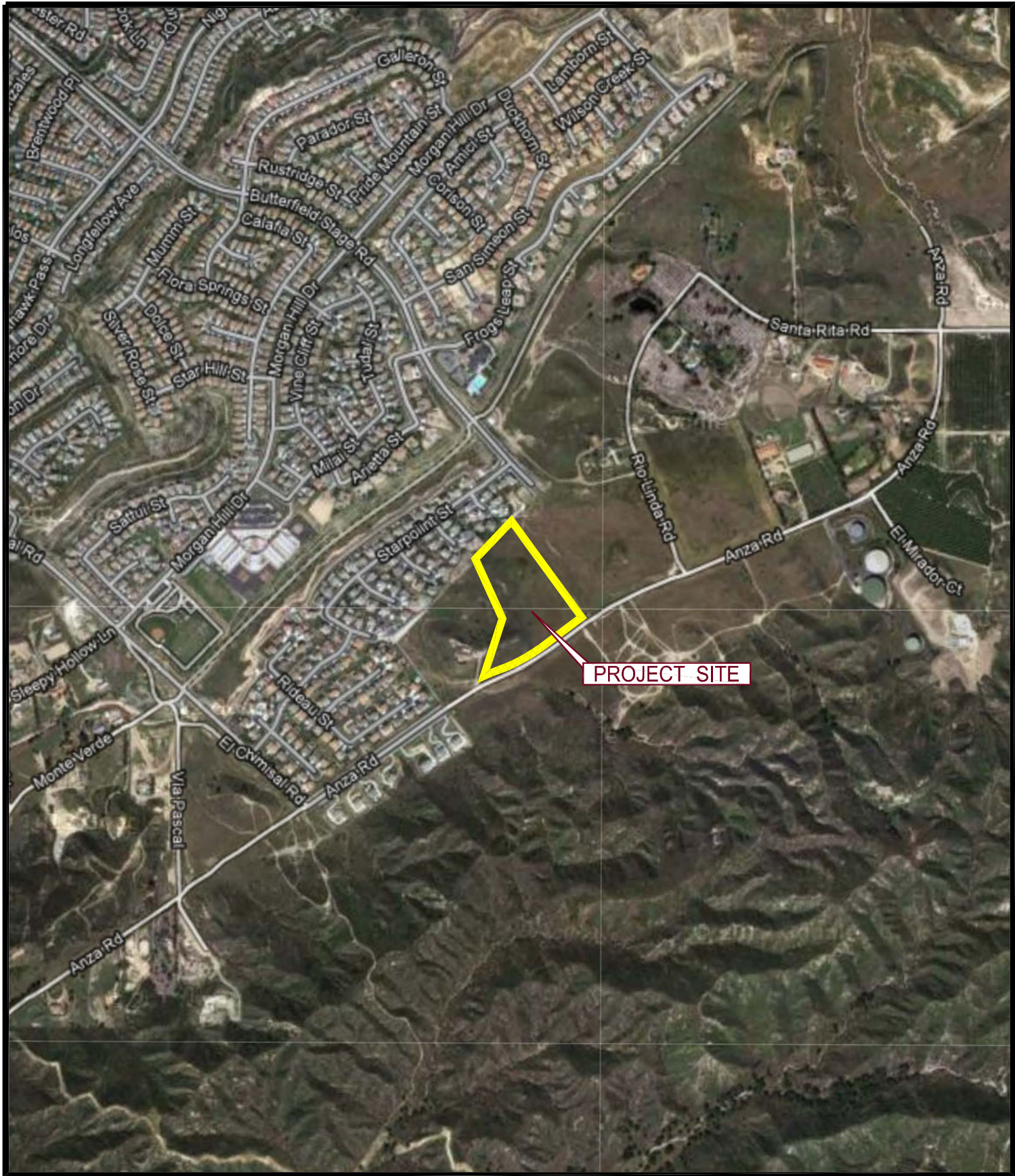
North side of Anza Road, approximately 1,700 feet east of its intersection with El Chimisal Road, in unincorporated Riverside County, California (**Site Vicinity Map**). The local Rancho California area is referred to as Morgan Hill: portion of protracted Section 23, Township 8 South and Range 2 West of the USGS Topographic Map, 7.5 Minute Series, Pechanga, California Quadrangle (**USGS Location Map**).

### ACREAGES

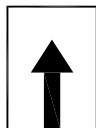
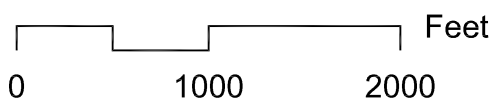
Recorded parcel size is 11.94 acres  
±40 acres surveyed

### APPLICANT/OWNER

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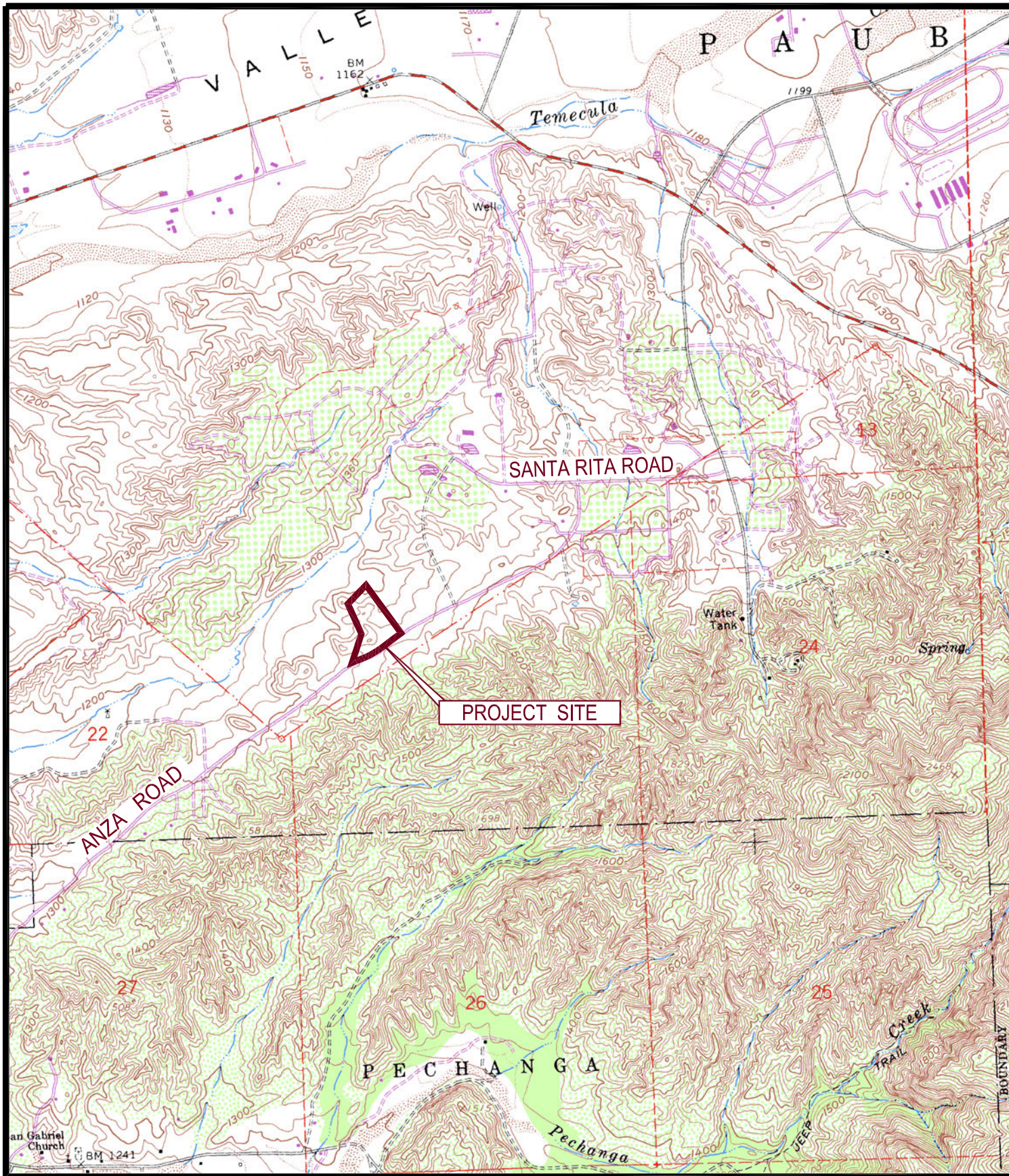
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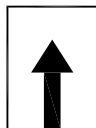
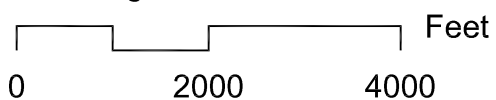
**SITE VICINITY MAP**

TTM 36644

PRINCIPE AND ASSOCIATES



Base Map Source: USGS 7.5 Min.  
Pechanga, Calif. Quad.



### USGS LOCATION MAP

TTM 36644

PRINCIPE AND ASSOCIATES

## PRINCIPAL INVESTIGATOR

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## SURVEY SUMMARY

The site is located within the Burrowing Owl Survey Area, Figure 6-4 of the MSHCP. As such, an independent assessment was made of the presence or absence of suitable burrowing owl habitats on the site and in a 150-meter buffer zone around the project boundary. The assessment determined that the majority of the site and buffer zone were providing suitable burrowing owl habitats consisting of large open expanses of annual grassland on gentle rolling and level terrain with active small mammal burrows. Critical habitat features capable of being used for roosting or nesting were also present on the site, and included natural burrows dug by California ground squirrels.

Four surveys were conducted between July 29 and August 19, 2016. During the 2016 nesting season surveys, burrowing owls were not observed. Critical burrowing owl habitats capable of being used for roosting or nesting were not being used. And, animal signs diagnostic of burrowing owls that are sometimes overlooked were not discovered anywhere on the site or in the buffer zone. There was no evidence of either active habitats presently being used by burrowing owls, or habitats abandoned within the last year.

With completion of this Nesting Season Survey, the project is consistent with Species Conservation Objective 5 of the MSHCP that was developed for the burrowing owl.

This is an update of the Nesting Season Survey for the Burrowing Owl (*Athene cunicularia hypugaea*), Tentative Tract Map 36644, prepared by Principe and Associates (September 9, 2013).

## ABSTRACT

Due to the presence of suitable and critical burrowing owl habitats, a **Nesting Season Survey for the Burrowing Owl (*Athene cunicularia hypugaea*)** was completed at the site. Four nesting season surveys were conducted between July 29 and August 19, 2016, and followed the Burrowing Owl Survey Instructions for the Western Riverside Multiple Species Habitat Conservation Plan Area (March 29, 2006).

## DESCRIPTION OF THE SITE, INCLUDING TOPOGRAPHY, HYDROGRAPHY, SOILS, VEGETATION ASSOCIATIONS AND SPECIES COMPOSITION, AND WILDLIFE SPECIES OBSERVED DURING VISIT(S)

### *Topography*

Topography on the site is dominated by a prominent hill. The hilltop occupies the southwest corner of the site, and has an elevation of 1380 feet. It slopes steeply downward to the east and west into flat-lying areas at elevations of 1340 feet and less. By contrast, it slopes gently downward to the north to form a ridge-like landform. The ridgeline is present along the entire west property line, with elevations ranging from 1360 to 1320 feet. Relatively flat-lying rolling terrain is present in the eastern and central portions of the site, where the topography slopes downward in a south to north direction. Elevations there range from a high of 1350 feet in the southeast corner to a low of 12950 feet in the northeast corner. The site is not rocky nor rock strewn.

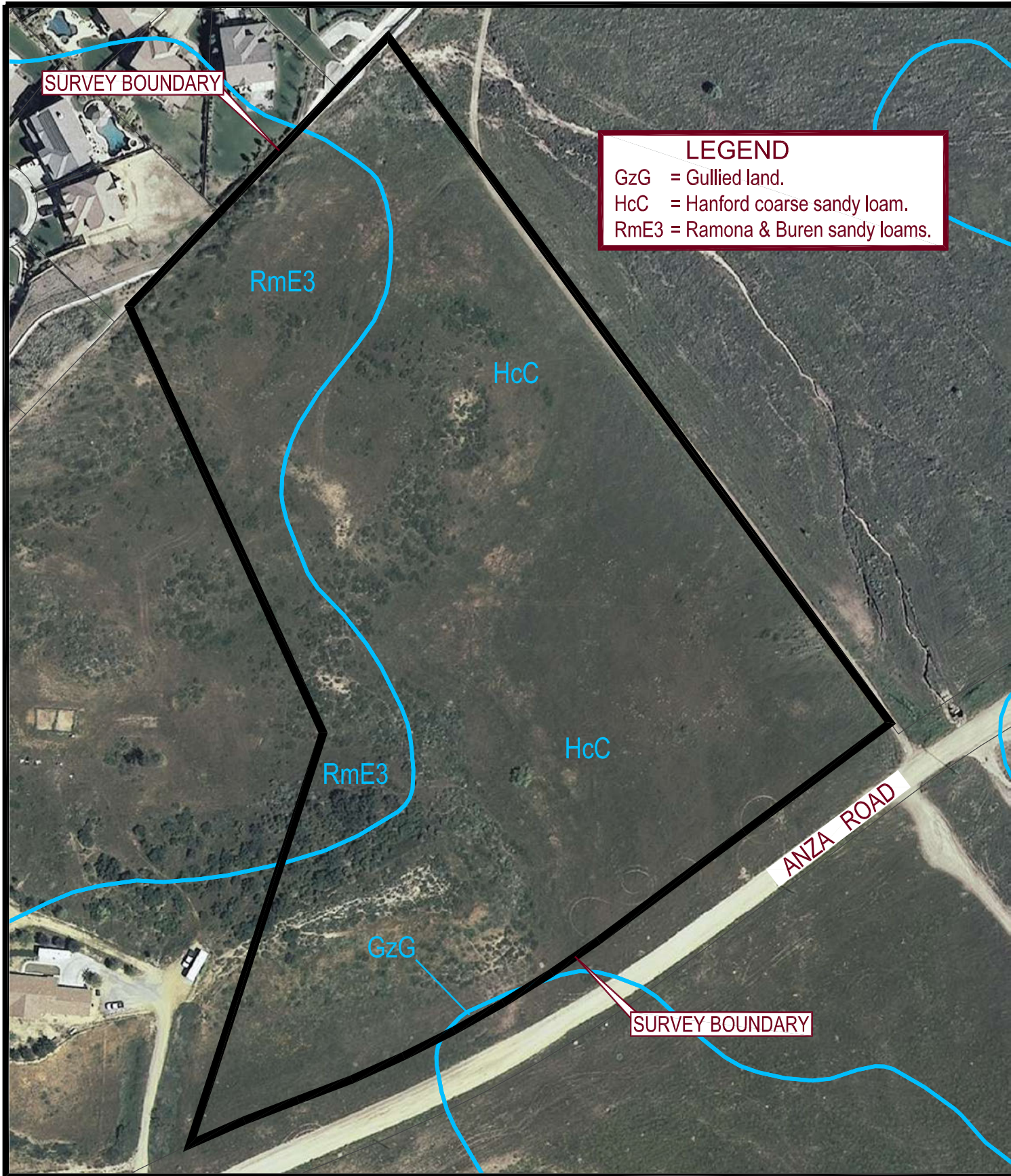
### *Hydrography*

As shown on the USGS Topographic Map, 7.5 Minute Series, Pechanga, California Quadrangle, natural watercourses of any kind are not present on the site (e.g., perennial or intermittent blue-line streams, ephemeral drainages, historical drainages, etc.). Drainage on the site is then by gravity flow. Storm water flows down the hillsides toward the low-lying terrain located in the northeast corner of the site. Other kinds of aquatic features are also not present on the site (i.e., vernal pools or swales, vernal pool-like ephemeral ponds, stock ponds or other human-modified depressions, etc.).

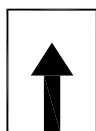
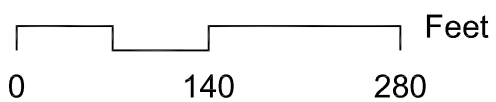
### *Soils*

Review of the "Soil Survey of Western Riverside Area, California" revealed that the surficial soils at the site are included in the Cajalco-Temescal-Las Posas Association (Soils of the Southern California Coastal Plain). Within this association, three soil types were previously mapped on the site (**Soils Map**):

- GzG – Gullied land
- HcC - Hanford coarse sandy loam, 2 to 8 percent slopes
- RmE3 - Ramona and Buren sandy loams, 15 to 25 percent slopes, severely eroded



Site area: 11.94 acres



**SOILS MAP**

TTM 36644

PRINCIPE AND ASSOCIATES

## **Vegetation Associations and Species Composition**

Based on the MSHCP Habitat Accounts in Volume 2 of the MSHCP, the Vegetation Associations present on the site are classified as Coastal Sage Scrub (5.09 acres) and Grasslands (6.85 acres) (**Biological Resources Map**).

**Coastal Sage Scrub Vegetation Association** is distributed throughout Western Riverside County, occupying approximately 159,000 acres (12 percent) of the MSHCP Plan Area. It is represented by three subassociations: Diegan coastal sage, Riversidian sage scrub and coastal scrub. As with the vegetation growing on the site, Coastal Sage Scrub in Riverside County is contained in the **Riversidean sage scrub Mapped Subassociation**.

Riversidean sage scrub is the dominant Coastal Sage Scrub Mapped Subassociation in the MSHCP Plan Area, occupying approximately 10.3 percent (136,278 acres) of the Plan Area. Riversidean sage scrub is dominated by a characteristic suite of low-statured, aromatic, drought-deciduous shrubs and subshrub species. Composition varies substantially depending on physical circumstances and the successional status of the habitat. Riversidean sage scrub is often patchily distributed throughout its range. Over a scale of several miles, it can be found in diverse mosaics with other plant communities, particularly Grasslands and Chaparral.

Riversidean sage scrub is now confined to the hill and ridge located in the western portion of the site. Growth form varies from dense to open. Invasive, non-native grasses have succeeded into the previously disturbed open areas. The dominant native shrub species occurring on the site is interior California buckwheat (*Eriogonum fasciculatum* subsp. *fasciculatum*), with coastal sagebrush (*Artemisia californica*), buck brush (*Ceanothus cuneatus* var. *cuneatus*), grassland goldenbush (*Ericameria palmeri* var. *pachylepis*), pine goldenbush (*Ericameria pinifolia*), valley lessingia (*Lessingia glandulifera* var. *glandulifera*), coastal deerweed (*Lotus scoparius* subsp. *scoparius*), bush lupine (*Lupinus longifolius*), \*tree tobacco (*Nicotiana glauca*), coastal prickly pear (*Opuntia xvaselyi*), scrub oak (*Quercus berberidifolia*), white sage (*Salvia apiana*) and poison oak (*Toxicodendron diversilobum*), occurring in less abundance. Understory plants are also present, including calabazilla (*Curcubita foetidissima*), paniculate tarweed (*Deinandra paniculata*), California everlasting (*Gnaphalium californicum*), purple needlegrass (*Stipa pulchra*), and vinegar weed (*Trichostema lanceolatum*).

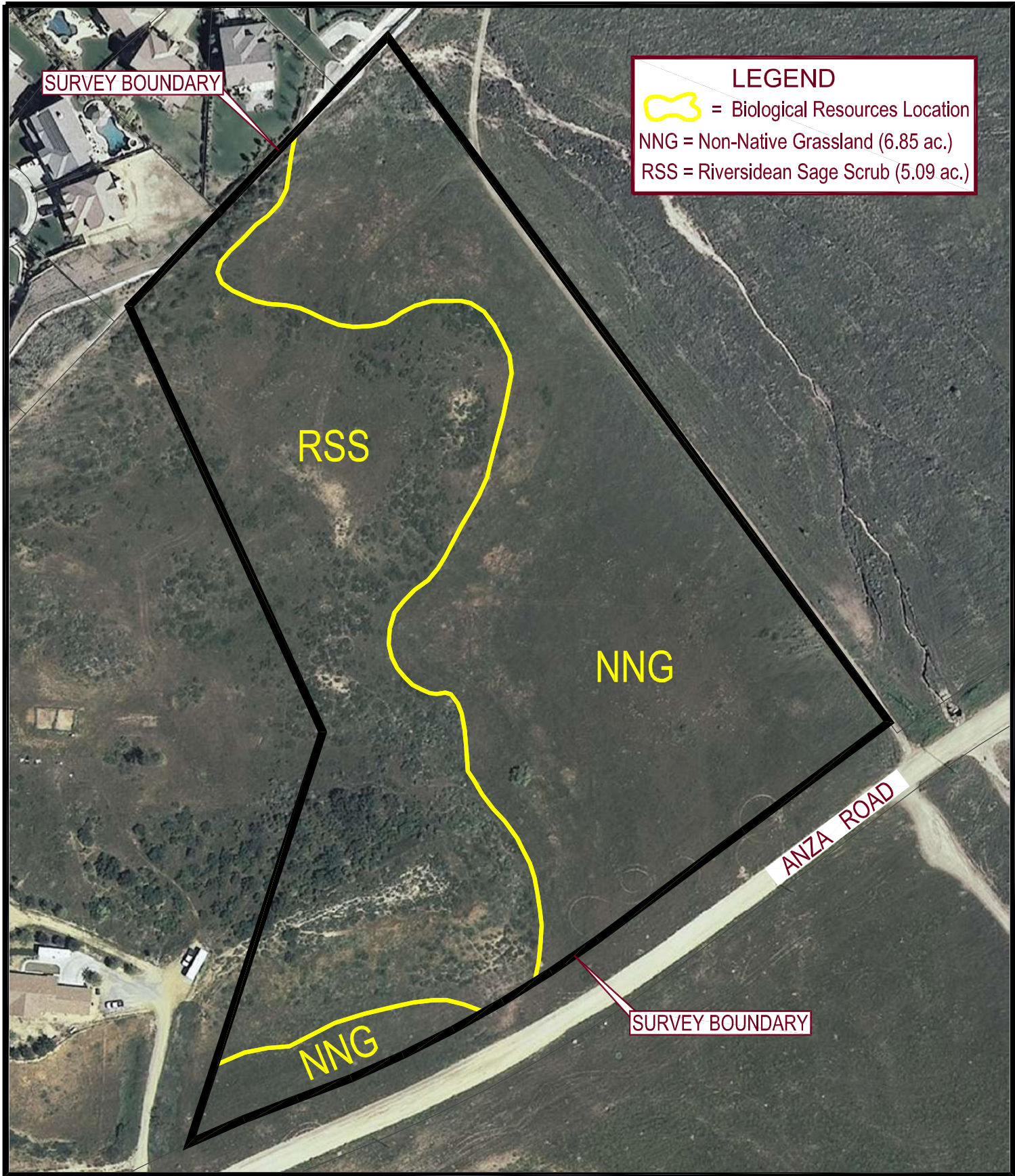
The **Grasslands Vegetation Association** occurs throughout most of Western Riverside County, and cover approximately 11.8% (154,421 acres) of the Plan Area. The **Non-native grasslands Vegetation Subassociation** is growing on the site. Non-native grasslands occur throughout the majority of the Plan Area (11.6%), usually within close proximity to urbanized or agricultural land uses.

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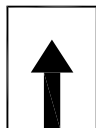
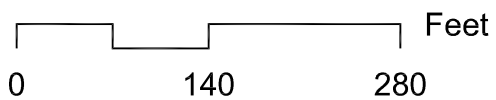
\*Denotes non-native species

Scientific nomenclature after Roberts, Jr., Fred M., Scott D. White, Andrew C. Sanders, David E. Bramlet, and Steve Boyd. 2004.





Site area: 11.94 acres



**BIOLOGICAL RESOURCES MAP**

TTM 36644

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Non-native grasslands are primarily composed of annual grass species introduced from the Mediterranean basin and other Mediterranean-climate regions with variable presence of non-native and native herbaceous species. Species composition of Non-native grasslands may vary over time and place based on grazing or fire regimes, soil disturbance and annual precipitation patterns. Non-native grasslands typically produce deep layers of organic matter which is inversely related to the abundance of non-native and native forbs. Non-native grasslands also typically support an array of annual forbs from the Mediterranean-climate regions. Low abundances of native species are sometimes present within Non-native grasslands. These species usually include disturbance specialists with several different growth forms (i.e., subshrubs, succulents and herbaceous annuals).

Non-native grasslands is growing in the eastern and central portions of the site. It is present throughout the flat-lying areas and along the bases of the hill and ridge. Invasive, non-native grasses and weeds dominate these areas, and are mixed with a few native species and pockets of native sage shrub species. Species include western ragweed (*Ambrosia psilostachya* var. *californica*), coastal sagebrush (*Artemisia californica*), narrow-leaved milkweed (*Asclepias fascicularis*), \*oat grasses (*Avena barbata* and *A. fatua*), \*shortpod mustard (*Brassica geniculata*), \*brome grasses (*Bromus diandrus* and *B. madritensis* subsp. *rubens*), \*common horseweed (*Conyza canadensis*), dove weed (*Croton setigerus*), calabazilla (*Curcubita foetidissima*), paniculate tarplant (*Deinandra paniculata*), interior California buckwheat (*Eriogonum fasciculatum* subsp. *fasciculatum*), slender buckwheat (*Eriogonum gracile*), \*filarees (*Erodium botrys* and *B. cicutarium*), telegraph weed (*Heterotheca grandiflora*), \*prickly lettuce (*Lactuca serriola*), valley lessingia (*Lessingia glandulifera* var. *glandulifera*), bush lupine (*Lupinus longifolius*), Mexican elderberry (*Sambucus mexicana*), and virgate wreath-plant (*Stephanomeria virgata* subsp. *virgata*).

### **Wildlife Species Observed**

The site is providing habitats for a low abundance and diversity of wildlife species. Species observed included western fence lizard (*Sceloporus occidentalis*), red-tailed hawk (*Buteo jamaicensis*), American kestrel (*Falco sparverius*), mourning dove (*Zenaida macroura*), Anna's hummingbird (*Calypte anna*), western kingbird (*Tyrannus verticalis*), common raven (*Corvus corax*), bushtit (*Psaltriparus minimus*), California towhee (*Pipilo crissalis*), California ground squirrel (*Spermophilus beecheyi*), and desert cottontail (*Sylvilagus audubonii*).

### **ASSESSMENT OF HABITAT SUITABILITY FOR BURROWING OWLS**

Burrowing owl habitats can be found in shortgrass prairies, annual and perennial grasslands, lowland scrub, agricultural lands and rangelands, prairies, coastal dunes, deserts, scrublands characterized by low-growing vegetation, and some artificial areas (i.e., golf courses, cemeteries, irrigation ditches, etc.). Suitable owl habitats may also include trees and shrubs if the canopy covers less than 30 percent of the ground surface, and they may also occur in forb and open stages of pinyon-juniper and

ponderosa pine habitats. They require large open expanses of sparsely vegetated areas on gentle rolling or level terrain with an abundance of active small mammal burrows. As critical habitat features, they require the use of rodent or other burrows for roosting and nesting. Burrows are the essential component of burrowing owl habitats. Natural and artificial burrows provide protection, shelter and nests for burrowing owls.

Based on the Burrowing Owl Survey Instructions for the Western Riverside Multiple Species Habitat Conservation Plan Area (March 29, 2006), an independent assessment was made of the presence of suitable burrowing owl habitats on the site and in a 150-meter (approximately 500 feet) buffer zone around the project boundary (**Step I of the Burrowing Owl Survey Instructions**).

The assessment determined that the majority of the site and buffer zone were providing suitable burrowing owl habitats consisting of large open expanses of annual grassland on gentle rolling and level terrain with active small mammal burrows. Critical habitat features capable of being used for roosting or nesting were also present on the site, and included natural burrows dug by California ground squirrels.

The hill and ridge portions of the site were not providing suitable burrowing owl habitats. The combination of the sloping topography and rather dense Riversidean sage scrub vegetation made the habitat unsuitable. Burrows were not discovered in those areas.

#### **DATE AND TIME OF VISIT(S), INCLUDING NAME OF THE QUALIFIED BIOLOGIST CONDUCTING SURVEYS, WEATHER AND VISIBILITY CONDITIONS, AND SURVEY METHODOLOGY**

Suitable burrowing owl habitats were carefully surveyed for the presence or absence of the burrowing owl. Thorough searches were conducted during morning hours in an attempt to directly observe this species or discover diagnostic sign, and followed **Step II of the Burrowing Owl Survey Instructions**.

The methodology used to prepare this Nesting Season Survey involved conducting complete visual and walk-over field surveys. Surveys were conducted by slowly walking through suitable habitats on the site. The survey transect was spaced to allow 100 percent visual coverage of the ground surface. The distance between transect center lines was no more than 20 meters ( $\pm 65$  feet).

Four surveys were conducted between July 29 and August 19, 2016. All surveys were conducted during weather that was conducive to observing burrowing owls outside of their burrows, and detecting burrowing owl sign. Surveys were not conducted during rain, high winds (> 20 mph), dense fog, or temperatures over 90°F. They were not conducted within five days of rain.

The onsite surveys were conducted by Paul A. Principe, Principal, Principe and Associates. Principe held a Federal Fish and Wildlife Permit (TE 786497-7) for 14 years (being renewed) and California Resident Scientific Collecting Permit (#801108-03

and Permanent ID #SC-002215) for 14 years (also being renewed), and is an authorized Biological Consultant, Riverside County Planning Department, Environmental Programs Division. He has been conducting biological surveys in Riverside County since 1980.

Principe was joined by another qualified surveyor, Jan Harrison, to conduct concurrent surveys in portions of the buffer zone. Harrison has been conducting biological surveys in Riverside County since 1996. Harrison was authorized by the U.S. Fish and Wildlife Service to conduct Threatened and Endangered Species surveys under Principe's permit for 14 years (being renewed).

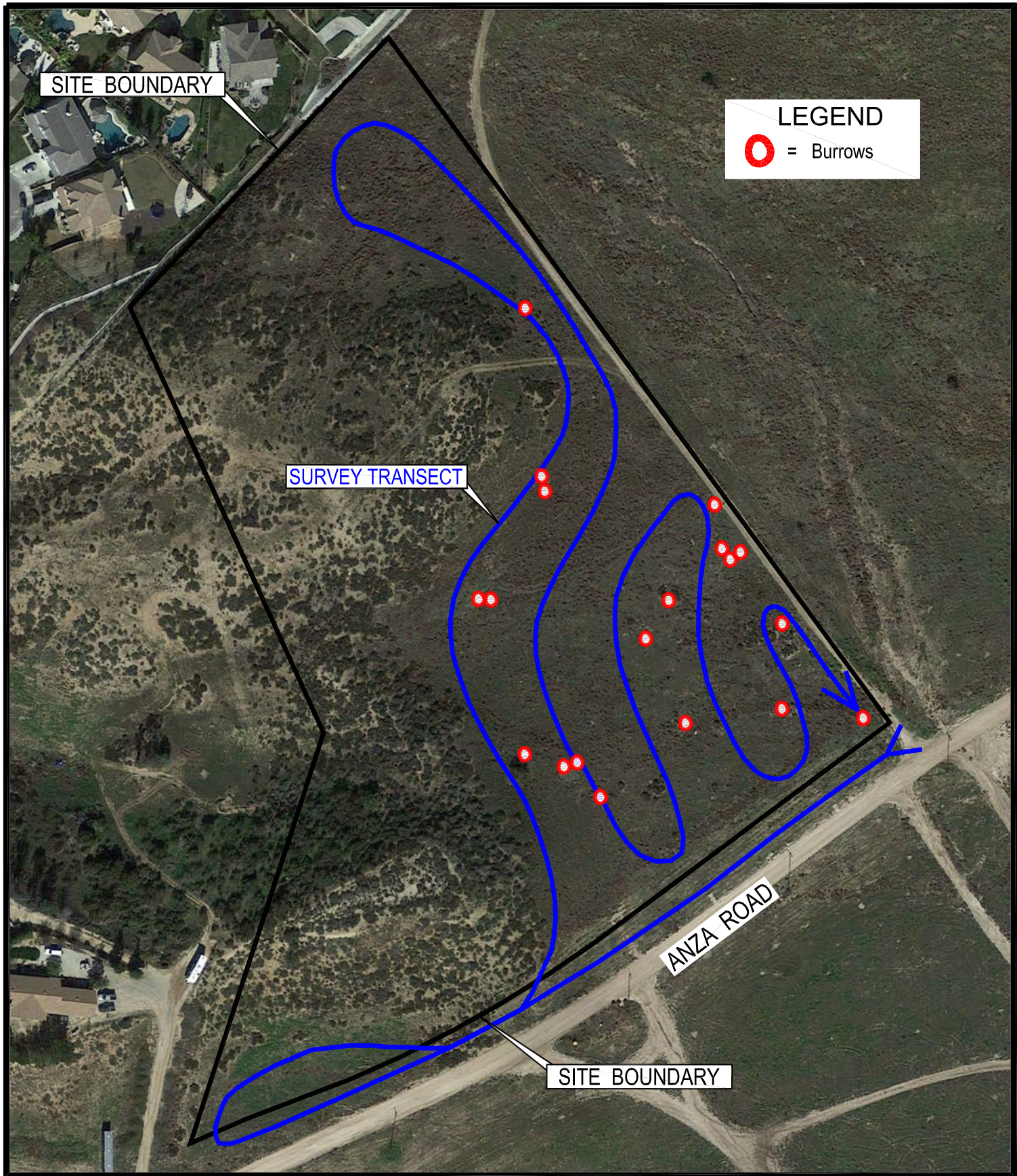
Following are the number and dates of surveys, start and stop times of surveys and the weather conditions at the beginning and end of each survey (shaded temperature in degrees Fahrenheit includes the wind chill factor, and wind speed in miles per hour is given as the range measured over a few moments with a Kestrel ® 2000):

1. July 29, 2016: Sunrise at 0559 hours  
Partly cloudy, 69°F, 0-1 mph (0600 hours)  
Partly cloudy, 72°F, 0-1 mph (0800 hours)
2. August 5, 2016: Cloudy, 65°F, 2-3 mph (0600 hours)  
Sunrise at 0604 hours  
Cloudy, 66°F, 3-4 mph (0800 hours)
3. August 12, 2016: Mostly clear, 63°F, 3-4 mph (0600 hours)  
Sunrise at 0609 hours  
Mostly clear, 70°F, 0-1 mph (0800 hours)
4. August 19, 2016: Clear, 61°F, 0-1 mph (0600 hours)  
Sunrise at 0613 hours  
Clear, 68°F, 1-2 mph (0800 hours)

**RESULTS OF TRANSECT SURVEYS, INCLUDING A MAP SHOWING THE LOCATION OF ALL BURROW(S) (NATURAL OR ARTIFICIAL) AND OWL(S), INCLUDING THE NUMBERS AT EACH BURROW, IF PRESENT, AND TRACKS, FEATHERS, PELLETS, OR OTHER ITEMS (PREY REMAINS, ANIMAL SCAT)**

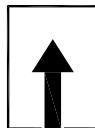
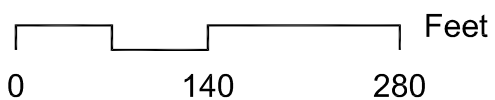
Burrowing owls or their diagnostic signs were not observed during any of the surveys.

The locations of critical burrowing owl habitats present on the site (e.g., natural burrows dug by California ground squirrels) have been overlaid on a base aerial photograph map of the site. The location of the survey transect has also been overlaid on this base aerial photograph map (**Critical Habitat/Survey Transect Map**). Photographs have been taken at various locations along the survey transect (**see Site Photographs attached**).



Source of Aerial Photo: Google Earth 2-05-2016

Scale: 1"= 140'



**CRITICAL HABITAT /  
SURVEY TRANSECT MAP**

TTM 36644

PRINCIPE AND ASSOCIATES

## **BEHAVIOR OF OWLS DURING THE SURVEYS**

Burrowing owls were not observed during any of the surveys.

## **SUMMARY OF BOTH WINTER AND NESTING SEASON SURVEYS INCLUDING ANY PRODUCTIVITY INFORMATION AND A MAP SHOWING TERRITORIAL BOUNDARIES AND HOME RANGES**

A protocol Survey for Winter Residents was not completed at this site.

During the 2016 nesting season surveys, burrowing owls were not observed. Critical burrowing owl habitats capable of being used for roosting or nesting were not being used (e.g., natural burrows dug by California ground squirrels). And, animal signs diagnostic of burrowing owls that are sometimes overlooked were not discovered anywhere on the site or in the buffer zone (e.g., molted feathers, cast pellets, prey remains, eggshell fragments, and/or excrement at or near a burrow entrance). There was no evidence of either active habitats presently being used by burrowing owls, or habitats abandoned within the last year.

## **MSHCP CONSIDERATIONS**

Completion of this Nesting Season Survey is consistent with Species Conservation Objective 5 of the MSHCP that was developed for the burrowing owl. To ensure direct mortality of burrowing owls is avoided, a pre-construction presence/absence survey should be conducted within thirty (30) days prior to ground disturbance at the site. The proposed project site would then be consistent with Species Conservation Objective 6 of the MSHCP.

## **ANY HISTORICAL INFORMATION (NATURAL DIVERSITY DATABASE, DEPARTMENT REGIONAL FILES, BREEDING BIRD SURVEY DATA, AMERICAN BIRDS RECORDS, AUDUBON SOCIETY, LOCAL BIRD CLUB, OTHER BIOLOGISTS, ETC.) REGARDING THE PRESENCE OF BURROWING OWLS ON THE SITE**

The burrowing owl occurs within the open lowlands of the central portion of Western Riverside County. It has a scattered distribution throughout the Western Riverside County Multiple Species Habitat Conservation Plan Area outside of montane areas. Breeding and burrow locations have not been identified within the University of California, Riverside (UCR) database, although most observations that have been recorded are probably located near a burrow due to the relatively sedentary nature of the species.

This species has been detected east of the Jurupa Mountains, along the Santa Ana River, at Lake Mathews, at Good Hope, Alberhill, Murrieta, March Air Reserve Base, the Lake Perris/Mystic Lake area, the Badlands, within the vicinity of Beaumont and

Banning, San Jacinto, Valle Vista, between San Jacinto River and Lakeview Mountains, west of Hemet, the area around Diamond Valley Lake, east and south of Lake Skinner area, along Santa Gertrudis Creek and Tocalota Creek, in Long Canyon, and along De Portola Road as documented in the UCR database and from other sources (USFWS 1996 unpublished data; California Science and Engineering Associates 1996).

The California Natural Diversity Database (CNDDDB) for the Pechanga, California Quadrangle does not include any occurrence records of the burrowing owl at the site. Two occurrence records were found in the CNDDDB from within a 4.0-mile radius of the site. One record is from 3.8 miles northeast of the site in 1994. This area is now the site of the Ronald Reagan Sports Park in the City of Temecula. The other record is from 3.4 miles northeast of the site in 2001. Occupied habitats included annual grassland and mixed annual grassland and lowland scrub. More recently, a map of Temecula Area Borrowing Owls was compiled by Ginny Short. There were no occurrence records located south of the City of Temecula to the Pechanga Indian Reservation and beyond.

Based on information from the University of California, Riverside (UCR) database, U.S. Fish and Wildlife Service (1996 unpublished data), California Science and Engineering Associates (1996), and clusters of occurrence record locations, Burrowing Owl Core Areas may include the Santa Ana River, Lake Mathews area, Lake Perris/Mystic Lake, playas west of Hemet, Lake Skinner/Diamond Valley Lake area, and Valle Vista. The nearest Core Area to the site includes the Lake Skinner/Diamond Valley Lake area. The site is located over six miles south of the Lake Skinner/Diamond Valley Lake area.

## **CERTIFICATION STATEMENT**

Date: August 24, 2016

I hereby certify that the statements furnished herein and in the attached exhibits present the data and information required to complete this Nesting Season Survey to the best of my ability, and that the facts, statements and information presented are true and correct to the best of my knowledge and belief.

*Paul A. Principe*

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**PRINCIPE AND ASSOCIATES**  
**Paul A. Principe**  
**Principal**

## REFERENCES

County of Riverside, Environmental Programs Department. Revised August 17, 2006. Burrowing Owl Survey Instructions for Western Riverside Multiple Species Habitat Conservation Plan Area, March 29, 2006.

Dudek & Associates, Inc. June 17, 2003. Riverside County Integrated Project. Final Western Riverside County Multiple Species Habitat Conservation Plan. Volume I, The Plan, and II.

Dudek & Associates, Inc. June 17, 2003. Riverside County Integrated Project. Final Western Riverside County Multiple Species Habitat Conservation Plan. Volumes II-A through E, The Reference Document.

Knecht, A. 1971. *Soil Survey of Western Riverside Area, California*. United States Department of Agriculture, Soil Conservation Service, Washington, D.C.

National Geographic Society (U.S.). 2002. *Field Guide to the Birds of North America*. Fourth Edition. National Geographic Society, Washington, D.C.

Parker, Robert et al. 1999. *Weeds of the West*. The Western Society of Weed Science. Newark, California. 630 pp.

Google Earth.

Search: Anza Road, Temecula, California.

Imagery Date: 2/5/2016

Image Source: NASA

<http://www.google.earth.com>

Principe and Associates. September 9, 2013. "Nesting Season Survey for the Burrowing Owl (*Athene cunicularia hypugaea*), Tentative Tract Map 36644".

Riverside County Information Technology. 2016. Map My County – Riverside County.

Roberts, Jr., Fred M., Scott D. White, Andrew C. Sanders, David E. Bramlet, and Steve Boyd. 2004. *The Vascular Plants of Western Riverside County, California, An Annotated Checklist*. F.M. Roberts Publications, San Luis Rey, California.

Sawyer, John O. and Todd Keeler-Wolf. 1995. *A Manual of California Vegetation*. California Native Plant Society, Sacramento, California. 471pp.

Thomas Olsen Associates, Inc. September 24, 2004. "General Biological Study and Habitat Assessment for Burrowing Owl".





Suitable burrowing owl habitats consisting of large open expanses of annual grassland on gentle rolling and level terrain are present on the site and in the buffer zone. As the grassland was not disced this year, it was not as suitable as it was during the 2013 surveys.

**SITE PHOTOGRAPH 1**  
TENTATIVE TRACT MAP 36644  
PRINCIPE AND ASSOCIATES



Another view of the large open expanses of annual grassland on gentle rolling and level terrain present on the site. The combination of sloping topography and dense sage scrub vegetation made the habitat present on top of the hill and ridge unsuitable.

**SITE PHOTOGRAPH 2**

TENTATIVE TRACT MAP 36644

PRINCIPE AND ASSOCIATES



Critical habitat features capable of being used for roosting or nesting were also present on the site, and included natural burrows dug by California ground squirrels.

**SITE PHOTOGRAPH 3**

TENTATIVE TRACT MAP 36644

PRINCIPE AND ASSOCIATES



Suitable burrowing owl habitat must also include an abundance of active small mammal burrows. Burrowing owl diet normally includes deer or white-footed mice, meadow voles and beetles. Although they eat mostly insects and small mammals, they also take reptiles, birds and carrion.

**SITE PHOTOGRAPH 4**  
TENTATIVE TRACT MAP 36644  
PRINCIPE AND ASSOCIATES