23. Santa Susana Mountains and Simi Hills SEA

Location

General

The Santa Susana Mountains and Simi Hills Significant Ecological Area (SEA) is located northwest of the San Fernando Valley within unincorporated areas of the County and the City of Los Angeles, west of Chatsworth. The area is south of State Route-126 and the Santa Clara River, west of the Interstate-5, and includes much of the Santa Susana Mountains to the north, the Santa Susana Pass, Chatsworth Reservoir, and the eastern portion of the Simi Hills to the south. This SEA encompasses much of the natural area of the Santa Susana Mountains in the County. The north face of the Santa Susana Mountains is the southwestern watershed of the Santa Clara River in the County, and on the south face, the Santa Susana Mountains are part of the direct coastal watershed as well as part of the watershed of the Los Angeles River. The Simi Hills are part of the direct coastal drainage in their southern area. The variations in vegetation communities are extensive. The area in the Santa Susana Mountains covered by the SEA is considered an important connective wildlife corridor among the San Gabriel Mountains, the Santa Clara River, and the Santa Monica Mountains.

The SEA is located at least partially in each of the following United States Geological Survey (USGS) 7.5' California Quadrangles: Calabasas, Canoga Park, Oat Mountain, Santa Susana, Val Verde, and Newhall.

General Boundary and Resources Description

The entire western boundary of the SEA follows the Ventura-Los Angeles County line from El Escorpion Park, west of the intersection of Valley Circle Boulevard and Vanowen Street in the West Hills community of the San Fernando Valley, and north to an area just south of the Santa Clara River near Salt Canyon Road. El Escorpion Park is adjacent to state park land just across the Ventura-Los Angeles County line. The small ridgeline where the SEA begins just south of El Escorpion Park separates the coastal drainage of Las Virgenes (tributary of Malibu Creek) from drainages that flow into the San Fernando Valley and the Los Angeles River. El Escorpion Park is at the southern end of Bell Canyon Park, which is also on Ventura-Los Angeles County line. The watercourse of Bell Canyon flows through the park. The SEA continues north, including the natural watershed of Dayton Canyon. Here on the southern side of Dayton Canyon is designated critical habitat for the Braunton’s milk vetch (Astragalus brauntonii), which is a locoweed that prefers a substrate of intermixed sandstone and carbonate beds, which is probably deposited at the margins of a former seacoast. The SEA circles around the community of Lakeside Park, which is excluded from the SEA, and then encircles and includes the Chatsworth Reservoir along boundaries of private property. The western boundary of the SEA follows the Ventura-Los Angeles County line, but bends to exclude development in upper Woolsey Canyon and Chatsworth Lake Manor.

From Chatsworth Reservoir, the SEA continues north with the west side along the Ventura-Los Angeles County line and the east side tracing natural habitat at the edge of the Simi Hills and the San Fernando Valley. The SEA extends eastward to include all of the Santa Susana Pass area, much of which is preserved in the Santa Susana Pass State Historic Park. Just across the Ventura-Los Angeles County line near State Route-118 in Ventura County are Corriganville Park, a former and current natural movie production area, and Rocky Peak Park. Corriganville is a regional park of the City of Simi Hills; Rocky Peak Park is administered by the Santa Monica Mountains Conservancy. Rocky Peak Park is the former Runkle Ranch and stretches from State Route-118 five miles northward to Las Llajas Canyon. The Park is a vital wildlife habitat linkage between the Simi
Hills and the Santa Susana Mountains. Spectacular sandstone boulders, outcroppings, oak savannas, and perennial water sources provide diverse habitat for vertebrates and a number of rare plants. The Ventura-Los Angeles County line and the SEA boundary cross directly over Rocky Peak here.

A very important wildlife passage between the Santa Susana Mountains and the Simi Hills is just west of the Ventura-Los Angeles County line connecting Corriganville Park and the Runkle Ranch. It is a broad tunnel under the freeway, which enabled the connection of the property that was divided by constructing State Route-118. This tunnel connects dirt roads and trails on either side, and is regularly used by mountain lions and other wildlife.

Most of the SEA from State Route-118 northward is designated critical habitat for the coastal California gnatcatcher (*Polioptila californica californica*), which is a diminutive bird that is becoming rare due to loss of its preferred habitat, which is coastal sage scrub. The critical habitat for this bird extends across the Ventura-Los Angeles County line along the extent of the Santa Susana Mountains into Ventura County.

North of State Route-118, the SEA excludes development in the area of Hialeah Springs (but includes the springs), and circles round the development to include the more sparse settlement in the Deer Lake Highlands area. The SEA boundary goes north along the watercourse of Browns Canyon to the confluence with Mormon Canyon. Here the SEA boundary climbs the ridgeline that separate Browns Canyon and Mormon Canyon to include Browns Canyon and the Michael D. Antonovich Regional Park at Joughin Ranch, and exclude the Mormon Canyon. Continuing up the ridge to its origin on the crest of Oat Mountain, the SEA boundary turns eastward along the ridgeline, excluding the oil fields in the upper reaches of Mormon Canyon and including the extensive natural areas of the north slope of the Santa Susana Mountains.

Along the Ventura-Los Angeles County line north of Rocky Peak, the SEA boundary crosses Blind Canyon (draining to San Fernando Valley), then Llajas Canyon (draining to Simi Valley and ultimately Mugu Lagoon), then El Toro and Chivo canyons (also draining to Mugu Lagoon). Northwest of Chivo, the crest of the Santa Susana Mountains is crossed, and drainages are tributaries of Salt Canyon and the Santa Clara River. The north edge of the critical habitat for the coastal California gnatcatcher is crossed near the crest, where the south-facing slopes that favor coastal sage scrub give way to the ridgeline and north-facing slopes that promote denser chaparral and oak woodlands. At the northern boundary of the SEA, the Santa Clara River SEA is contiguous as is the critical habitat for the state and federally-endangered least Bell’s vireo (*Vireo bellii pusillus*), which is a small bird that usually nests next to perennial water.

From the northwesterly corner, the boundary travels east along the north side of Salt Canyon, and then along the northern side of the Salt Canyon East Fork. Where the East Fork turns south, the SEA boundary continues east to encompass the steeper southern areas along Potrero Canyon and all of the Pico Canyon drainage south of Potrero. The SEA boundary is truncated at the Stevenson Ranch development, including the Wickham Canyon tributary of Pico in the SEA, but excluding most of Dewitt Canyon. This boundary of the SEA is essentially following the northern edge of the Salt Creek open space that was approved with the Newhall Ranch Specific Plan. In the vicinity of Pico Canyon, the boundary continues eastward to encompass the Lyon Canyon watershed and an unnamed watershed just north of Lyon up to the west side of Interstate-5. Along Interstate-5, the SEA boundary continues along the line of natural vegetation (west and southwest side of Gavin Canyon) including the watersheds of tributaries Towsley, Wiley, Learning, Rice, and East canyons. The boundary continues east along the western edge of Interstate-5 to an area just west of the Angeles City line, near the interchange with State Route-14. Here the boundary excludes the drainage of Sunshine Canyon, which is involved in the Sunshine Canyon Landfill used by both the City of Los Angeles and the County. Critical habitat for the coastal California gnatcatcher is the watersheds of Towsley, Wiley, Rice, and East canyons south of the Interstate-5 below about the
North across the Interstate-5 is the Newhall Wedge. The Newhall Wedge is a very rugged part of the Santa Susana Mountains, with substantial natural vegetation of oak woodlands, chaparral, and coastal sage scrub. The Newhall Wedge is truncated by the flood plains of tributaries of the South Fork of the Santa Clara River to the north, east and west, and these flood plains have had extensive development as the City of Santa Clarita. (Gavin Canyon is one of these tributaries.) Important connective areas are the road crossings of the Interstate-5 and State Route-14. The connection to the Santa Clara River SEA is the Los Pinetos Road underpass of the State Route-14. Consistent wildlife movement has been recorded with motion-activated cameras there. The Weldon Canyon Road overpass of the Interstate-5 is another connection for the Newhall Wedge with the main part of the SEA. The Old Road underpass of the Interstate-5 is a broad connection. The Calgrove underpass is another broad connection, but busy with traffic. Natural areas are adjacent to all these under- and overpasses. The South Fork of the Santa Clara River is formed by the junction of Towsley, Wiley and East canyons in the northeast corner of Michael D. Antonovich Open Space. Its underpass of Interstate-5 has a natural bottom that is used frequently by wildlife, but on the east side of Interstate-5 there is a series of 15 feet drops and channeled sides, which is unlikely that terrestrially-tied wildlife would continue into the populated parts of the City of Santa Clarita along the South Fork. Critical habitat for the coastal California gnatcatcher is in most of the Newhall Wedge part of the SEA between the Interstate-5 and the Sierra Highway that is just west of State Route-14.

On the west side of Sunshine Canyon, a broad lobe of the SEA extends along the ridgeline, which separates Sunshine and Bee Canyon to include Bee Canyon Park and Mission Point of O'Melveny Park. This is an area with walnut woodlands, oak woodlands, grasslands, and chaparral including coastal sage scrub, which is the diverse and green vegetation typical of the Santa Susana Mountains. Critical habitat for the coastal California gnatcatcher covers O'Melveny Park, except for the ridgeline of Mission Point, which is above the 2400 feet contour. The SEA boundary travels west from Mission Point along the ridgeline above the Aliso Canyon Oil Field and turns south at the western edge of the Aliso Canyon Oil Field, along the ridgeline between Mormon and Browns canyons. Critical habitat for the coastal California gnatcatcher extends below about the 2400 feet contour (including Mormon and Browns canyons) and roughly is within the SEA north of State Route-118.

The SEA includes a variety of topographic features; the northern portion of the SEA encompasses Oat Mountain and much of the Santa Susana Mountains from the Ventura-Los Angeles County line east to Interstate-5. Portions of many of the canyons associated with the Santa Susana Mountains and Oat Mountain are also included, such as Salt Canyon, Potrero Canyon, Pico Canyon, Towsley Canyon, El Toro Canyon, Sulphur Canyon, Devil Canyon, Ybarra Canyon, Browns Canyon, Bee Canyon, and Mormon Canyon. Several perennial stream areas occur within these canyons, and there are many natural springs. The north slopes of the Santa Susana Mountains are within the Santa Clara River watershed, which drains the Los Padres National Forest to the north, the Angeles National Forest to the northeast and east, and the Santa Susana Mountains to the south and southeast. The remainder of the SEA is within the Los Angeles River watershed. The majority of the land in the SEA is natural open space with very sparse disturbances in the form of ranches, oil wells, and unimproved access roads. The SEA consists of east-west and northwest trending primary ridges and north-south trending secondary ridges.

The peak of Oat Mountain represents the highest point in the SEA at 3,747 feet above mean sea level (MSL). From Oat Mountain, one can appreciate the diverse influences that create extremely diverse habitat within this SEA. One can see downstream along the Santa Clara River to the mouth of the Pacific Ocean and to the northern Channel Islands. Across the San Fernando Valley are the Santa Monica Mountains, and the Simi Hills enclose the west end of the Valley. To the east are the ascending ridges of the San Gabriel Mountains, and to the northeast the Santa Clara River continues upstream towards the Antelope Valley and the Mojave Desert. Coastal, valley, montane,
and desert influences all meet within this small mountain range.

Open space within the SEA supports this great variety of communities, but is dominated by chaparral, oak woodlands, coastal sage scrub, bigcone Douglas-fir-canyon oak woodland, and grasslands; however, there are numerous examples of special vegetation. Not uncommon are cherry woodlands, which are dominated by holly leaf cherry (*Prunus ilicifolia*). These mountains are a meeting area of the (regular) Douglas fir (*Pseudotsuga menziesii*) and the bigcone Douglas-fir (*Pseudotsuga macrocarpa*). There are a number of special endemic plants, such as the Santa Susana tarweed (*Deinandra minthornii*), which is a tarplant like few others since it is perennial. Its distribution spreads through the Simi Hills and into the Santa Monica Mountains, but it is primarily at home among the sandstone boulders and terraces, which prevail in the Santa Susana Mountains. The Santa Susana Mountains are the only known place in the County with members of the uncommon Palmer’s oak (*Quercus palmeri*). This desert oak can be very long-lived. A clone found in Riverside County was judged to have started from an acorn in the last Ice Age, over 10,000 years ago. Other oaks with groves in the Santa Susanas include coast live oak (*Quercus agrifolia*), valley oak (*Q. lobata*), canyon live oak (*Q. chrysolepis*), scrub oak (*Quercus berberidifolia*), and interior live oak (*Q. wislezenii*). The numerous creeks and canyons support riparian scrub and woodland communities with oaks, sycamores, and willows. There are walnut woodlands of the California black walnut (*Juglans californica*) mixed with flowering ash (*Fraxinus dipetala*) and Mexican elderberry (*Sambucus mexicana*) and coast live oak. Flowering ash may be a tree up to 60 feet tall in the Santa Susana Mountains, whereas it usually is a low tree or even spindly shrub. The woodlands dominated by walnuts and flowering ash appear to be unique to the Santa Susana Mountains. The bigcone Douglas-fir-canyon live oak forest at higher elevations represents one of the northwesternmost examples of this community. At its southern end, the SEA includes the eastern portion of the Simi Hills, including the east-facing slopes descending from Chatsworth Peak. Chatsworth Reservoir forms a portion of the south boundary and is currently dry, except for a small detention basin north of the reservoir.

Chatsworth Reservoir is now dry and is a superfund clean-up site due to the dumping of chemicals from a rocket facility that used to be in the Simi Hills. However, it has a variety of very interesting habitat with several protected avian communities of songbirds and geese, which makes it valuable for bird study by students, researchers, and naturalists. There is a perennial pond at the north end that supports freshwater marsh, which is an extremely scarce habitat in the County and Southern California. This pond is on the Pacific Flyway, and supports numerous kinds of waterfowl during the spring and fall migration periods, especially because of the adjacent grasslands. The periphery of the reservoir is savannah, with a mixture of valley and coast live oaks (*Q. lobata* and *Q. agrifolia*), some in small stands.

The majority of the SEA is within the unincorporated area of the County.

**Vegetation**

The plant communities within the SEA are composed of numerous plant species. These plant species are adapted to a Mediterranean climate with a cool, wet season followed by a hot, dry season. Due to the topographic complexity and coastal and desert influences, the SEA supports a wide diversity of plant species.

Plant species observed or recorded in previous documentation within the SEA are indicated in the *Comprehensive Floral & Faunal Compendium of the Los Angeles County SEAs*. Sensitive plant species occurring or potentially occurring within the SEA are discussed in the Sensitive Biological Resources section.

Descriptions and general locations of each plant community present within the SEA are given below. These include chaparral, coastal sage scrub, alluvial scrub, coast live oak woodlands, valley oak
woodland, mainland cherry forest, non-native grassland, native grassland, southern willow scrub, southern cottonwood-willow riparian forest, and disturbed communities.

**Chaparral**: Consists of a broad mix of evergreen species and generally occurs below 5,000 feet in Southern California. Dominant species consist of broad-leaved or needle-leaved sclerophyllous (hard-leafed) shrubs, forming a dense, impenetrable cover with little or no understory growth. The understory typically consists of considerable accumulation of leaf litter. In areas of less dense shrub cover, the understory consists of non-native grasses and other annual forbs. Dominant species include chamise, laurel sumac (*Malosma laurina*), hoary-leaf ceanothus (*Ceanothus crassifolius*), chapparal whitethorn (*Ceanothus leucodermis*), and toyon (*Heteromeles arbutifolia*). Chaparral is the dominant plant community within the SEA and covers many of the steep slopes and hillsides in the upper elevations.

**Corresponding MCV communities**:
- *Adenostoma fasciculatum* (chamise chaparral) Shrubland Alliance
- *Adenostoma fasciculatum-Salvia apiana* (chamise-white sage chaparral) Shrubland Alliance
- *Arctostaphylos glauca* (bigberry manzanita chaparral) Shrubland Alliance
- *Ceanothus crassifolius* (hoary leaf ceanothus chaparral) Shrubland Alliance
- *Ceanothus leucodermis* (chaparral whitethorn) Shrubland Alliance
- *Ceanothus megacarpus* (big pod ceanothus chaparral) Shrubland Alliance
- *Ceanothus spinosus* (greenbark ceanothus chaparral) Shrubland Alliance
- *Ceanothus oliganthus* (hairy leaf ceanothus chaparral) Shrubland Alliance
- *Prunus ilicifolia* (holly leaf cherry chaparral) Shrubland Alliance
- *Rhus ovata* (sugarbush chaparral) Shrubland Alliance

**Coastal Sage Scrub Communities**: Consist of drought-deciduous, low, soft-leaved shrubs and herbs on gentle to steep slopes below 3,000 feet in elevation. Several dominant species may occur within scrub communities, with some areas overwhelmingly dominated by one or two species. California sagebrush (*Artemisia tridentata*), California buckwheat (*Eriogonum fasciculatum*), California brittle bush (*Encelia californica*), purple sage (*Salvia leucophylla*), and deerweed (*Acmispon glaber*). Coastal sage scrub is found at the lower elevations within the SEA on drier south-facing slopes, but can also be found on the north-facing slopes and canyon of the Santa Susana Mountains.

**Corresponding MCV communities**:
- *Artemisia californica* (California sagebrush scrub) Shrubland Alliance
- *Artemisia californica-Salvia mellifera* (California sagebrush-black sage scrub) Shrubland Alliance
- *Artemisia californica-Eriogonum fasciculatum* (California sagebrush-California buckwheat scrub) Shrubland Alliance
- *Encelia californica* (California brittle bush scrub) Shrubland Alliance
- *Dendromecon rigida* (bush poppy scrub) Shrubland Alliance
- *Isocoma menziesii* (Menzie’s golden bush scrub) Shrubland Alliance
- *Salvia apiana* (white sage scrub) Shrubland Alliance
- *Salvia leucophylla* (purple sage scrub) Shrubland Alliance
- *Salvia mellifera* (black sage scrub) Shrubland Alliance
- *Eriogonum cinereum* (ashy buckwheat scrub) Shrubland Alliance
- *Eriogonum fasciculatum* (California buckwheat scrub) Shrubland Alliance
- *Ericameria linearifolia* (narrowleaf goldenbush scrub) Provisional Shrubland Alliance
- *Hazardia squarrosa* (sawtooth golden bush scrub) Shrubland Alliance
- *Lotus scoparius* ([*Acmispon glaber*] deer weed scrub) Shrubland Alliance
• *Lupinus albifrons* (silver bush lupine scrub) Shrubland Alliance
• *Malacothamnus fasciculatus* (bush mallow scrub) Shrubland Alliance

**Alluvial Scrub:** Consists of a mixture of shrubs that colonize sandy-gravelly flood deposited soils within intermittent creeks, arroyos, and drier terraces in large washes. This community intergrades with sage scrub communities and riparian communities and, therefore, occurs adjacent to these communities. Great basin sagebrush (*Artemisia tridentata*), scalebroom (*Lepidospartum squamatum*), quail bush (*Atriplex lentiformis*), and skunk bush (*Rhus aromatica*). Alluvial scrub is predominantly found at the northern end of the SEA in Salt Canyon.

Corresponding MCV communities:
- *Artemisia californica-Eriogonum fasciculatum* (California sagebrush-California buckwheat scrub) Shrubland Alliance
- *Lepidospartum squamatum* (scalebroom scrub) Shrubland Alliance
- *Malosma laurina* (laurel sumac scrub) Shrubland Alliance

**Coast Live Oak Woodlands:** Commonly occur along drainages that experience at least a seasonal flow or in other areas under mesic conditions. Soil structure and soil moisture are the most important limiting factors for the survival of oak woodlands; soils must be deep, uncompact, fertile, well-aerated, and well-drained. This community is dominated by coast live oak. If sufficient groundwater is present, western sycamore (*Platanus racemosa*), which is usually associated with riparian habitats, may also occur in the oak woodland. Oak woodlands occupy areas within the canyons and drainages of the SEA.

Corresponding MCV communities:
- *Quercus agrifolia* (coast live oak woodland) Woodland Alliance

**Valley Oak Woodland:** An open-canopy woodland found on deep, well-drained alluvial soils below 2,000 feet. This community is almost exclusively dominated by valley oak (*Quercus lobata*) with a grassy understory to form a savannah-like community. This community is located in small pockets in the eastern portion of the SEA.

Corresponding MCV communities:
- *Quercus lobata* (valley oak woodland) Woodland Alliance

**Mainland Cherry Forest:** Not well described, but is typically composed of tall stands of holly leaf cherry (*Prunus ilicifolia*) on rocky, dry, north-facing slopes. Within the SEA, coast live oak is co-dominant within this community and can be found in canyons in the northern portion of the SEA. This community can also be found in association with alluvial scrub in the northwestern portion of the SEA as it approaches the Santa Clara River.

Corresponding MCV communities:
- *Prunus ilicifolia* (Holly leaf cherry chaparral) Shrubland Alliance

**Grassland Communities:** Consist of low, herbaceous vegetation that are dominated by grasses but generally also harbor native forbs and bulbs, as well as naturalized annual forbs. Topographic factors that contribute to grassland presence include gradual slopes or flat areas with deep, well-developed soils in areas below 3,000 above MSL. The species richness of grassland communities is dependent upon a number of land use factors, including intensity and duration of natural or anthropogenic disturbances, such as grazing. Heavily grazed grasslands have a lower species
Native grassland is often associated with coastal sage scrub and is found in pockets in close proximity to coastal sage scrub and non-native grassland. This community consists of at least 10 percent relative cover of native herbaceous plants (grasses and forbs). The remaining vegetative cover is made up of non-native grasses found in annual grassland and a variety of annual, showy flowers, such as golden stars (*Bloomeria crocea*) and blue-eyed grass (*Sisyrinchium bellum*). Small patches of native grassland can be found scattered throughout the SEA mostly in openings in coastal sage scrub and mixed with non-native grasslands.

**Corresponding MCV communities:**

- *Leymus condensatus* (giant wild rye grassland) Herbaceous Alliance
- *Nassella cernua* ([*Stipa cernua*] nodding needle grass grassland) Provisional Herbaceous Alliance
- *Nassella lepida* ([*Stipa lepida*] foothill needle grass grassland) Provisional Herbaceous Alliance
- *Nassella pulchra* ([*Stipa pulchra*] purple needle grass grassland) Herbaceous Alliance

Non-native grassland consists of dominant invasive annual grasses that are primarily of Mediterranean origin. Dominant species found within this community include slender wild oat (*Avena barbata*), wild oat (*A. fatua*), ripgut brome (*Bromus diandrus*), and red brome (*B. madritensis ssp. rubens*).

**Corresponding MCV communities:**

- *Avena (barbata, fatua)* (Wild oats grasslands) Semi-Natural Herbaceous Stands
- *Brassica (nigra)* and other mustards (Upland mustards) Semi-Natural Herbaceous Stands
- *Bromus (diandrus, hordeaceus)-Brachypodium distachyon* (Annual brome grasslands) Semi-Natural Herbaceous Stands
- *Bromus rubens-Schismus (arabicus, barbatus)* ([*Bromus madritensis ssp. rubens*] Red brome or Mediterranean grass grasslands) Semi-Natural Herbaceous Stands
- *Centaurea (solstitialis, melitensis)* (Yellow star-thistle fields) Semi-Natural Herbaceous Stands
- *Lolium perenne* ([*Festuca perennis*] perennial rye grass fields) Semi-Natural Herbaceous Stands

**Southern Willow Scrub:** A riparian community occurring within and adjacent to watercourses. The vegetation within this community is adapted to seasonal flooding. Southern willow scrub is characterized by dense, broad leafed, winter-deciduous riparian thickets dominated by one or more willow species (*Salix* spp.) Most stands are too dense to allow understory development. The dominant species of this community within the SEA are arroyo willow (*Salix lasiolepis*), and red willow (*S. laevigata*), with less common associates such as mulefat (*Baccharis salicifolia*). This community occurs in segments along portions of the intermittent drainages within the SEA.

**Corresponding MCV communities:**

- *Salix exigua* (Sandbar willow thickets) Shrubland Alliance
- *Salix lasiolepis* (Arroyo willow thickets) Shrubland Alliance

**Southern Cottonwood-Willow Riparian Forest:** Consists of an open, broad-leaved, winter-deciduous riparian forest dominated by Fremont cottonwood (*Populus fremontii*), black cottonwood (*P. trichocarpa*), and several willow species, including arroyo willow and red willow. This community occupies much of the Santa Clara River adjacent to the northern boundary of the SEA, and also occurs within the larger, intermittent and perennial drainages within the SEA.

**Corresponding MCV communities:**
**Populus fremontii** (fremont cottonwood forest) Forest Alliance

**Populus trichocarpa** (black cottonwood forest) Forest Alliance

Disturbed or Barren Areas: Areas that either completely lack vegetation or are dominated by ruderal species. Ruderal vegetation typically found onsite include non-native grasses and a high proportion of weedy species, including tocalote, telegraph weed, tree tobacco, doveweed, black mustard, and thistle species. Several disturbed areas occur scattered throughout the SEA and take the form of residential developments, highways, fire breaks, dirt access roads, trails, transmission poles, and other similarly disturbed areas.

Corresponding MCV communities:

No corresponding communities at this time

**Wildlife**

Wildlife within the SEA is generally diverse and abundant due to the large acreage of natural open space and the diversity of habitat types. While a few wildlife species are entirely dependent on a single vegetative community, the entire mosaic of all the vegetation communities within the SEA and adjoining areas constitutes a functional ecosystem for a variety of wildlife species; this applies to the SEA and the regional ecosystem.

The analysis of invertebrates in this study is difficult due to the lack of data, although limited studies have been conducted. The SEA is believed to support healthy populations of a diverse assortment of countless invertebrate species. Amphibian populations are generally restricted in semi-arid and arid habitats but may be particularly abundant where riparian areas occur. The SEA is likely to support a variety of amphibians in abundance within wetland areas along the major canyon bottoms and the moister oak woodland areas. Many essential reptilian habitat characteristics, such as open habitats that allow free movement and high visibility, and small mammal burrows for cover and escape from predators and extreme weather, are present within the SEA. These characteristics, as well as the variety of habitat types present, are likely to support a wide variety of reptilian species.

The scrubland, woodland, riparian, and grassland habitats in the SEA provide foraging and cover habitat for year-round residents, seasonal residents, and migrating song birds. In addition, the SEA encompasses many year-round water sources, abundant raptor foraging, perching, and nesting habitat. The combination of these resources, as well as the mosaic of many community types, provide for an unusually high diversity of bird species. Several of these species may use this SEA as their only consistent occurrence in the southeastern portion of the County.

Mammal populations within the SEA are diverse and reflective of the diversity of habitat types. Unlike many other inland hills within the Los Angeles Basin, this SEA is large enough to support relatively stable and large mammal populations despite the urban surroundings; even the large carnivores, including the black bear and mountain lion, are known from the SEA. This indicates the presence of intact food chains and complete communities that have a complex, resilient food web.

All wildlife species previously recorded, as well as those expected to occur, within the SEA are indicated in the *Comprehensive Floral & Faunal Compendium of the Los Angeles County SEAs*. Sensitive wildlife species occurring or potentially occurring within the SEA are discussed in the Sensitive Biological Resources section.

**Wildlife Movement**

The SEA includes several important linkages for wildlife movement. The Simi Hills and Santa Susana Mountains provide a vast open space corridor to foster wildlife movement between the
Santa Monica Mountains to the south, San Gabriel Mountains to the east, and Los Padres National Forest to the north in the western San Gabriel Mountains of the Transverse Ranges. Dense, natural habitat associated with the majority of the SEA provides excellent opportunities for concealment and water sources, while the grasslands provide an abundance of prey. Examples of wildlife that use these linkages include mountain lion (\textit{Puma concolor}), mule deer (\textit{Odocoileus hemionus}), coyote (\textit{Canis latrans}), bobcat (\textit{Lynx rufus}), and a number of medium-sized animals.

**Sensitive Biological Resources**

Sensitive biological resources are habitats or individual species that have special recognition by federal, state, or local conservation agencies and organizations as endangered, threatened, and/or rare. This is due to the species’ declining or limited population sizes, which usually results from habitat loss. Watch lists of such resources are maintained by the California Department of Fish and Game (CDFG), the United States Fish and Wildlife Service (USFWS), and special groups, such as the California Native Plant Society (CNPS). The following sections indicate the habitats as well as plant and animal species present, or potentially present within the SEA, which have been accorded special recognition. When species are federally-listed as endangered or threatened, they often have federally-designated, geographically-specific "critical habitat areas." Critical habitat areas, after extensive study by experts, are judged to be essential to conservation and maintenance of the species. Critical habitats for the Braunton’s milkvetch and coastal California gnatcatcher are described in the General Boundary and Resources Description section.

**Sensitive Plan Communities and Habitats**

The SEA supports several habitat types considered sensitive by resource agencies. These are inventoried by California Department of Fish and Game (CDFG) in the California Natural Diversity Database (CNDDB) [2011]. The CNDDB includes state and federally-listed endangered, threatened, and rare vascular plants, as well as several sensitive vertebrate species. These communities include chamise-white sage chaparral, holly leaf cherry chaparral, California brittle bush scrub, white sage scrub, narrowleaf goldenbush scrub, sawtooth golden bush scrub, scalebroom scrub, valley oak woodland, holly leaf cherry chaparral, giant wild rye grassland, nodding needle grass grassland, foothill needle grass grassland, purple needle grass grassland, Fremont cottonwood forest, and black cottonwood forest, which occur throughout the SEA. These communities, or closely related designations, are considered high priority communities by the CDFG, which indicates that they are experiencing a decline throughout their range. The array and composition of these communities has been discussed in the Vegetation section.

**Sensitive Plant Species**

The statuses of rare plants are hierarchically categorized by the CNPS using a rank and decimal system. The initial category level of Rare Plant Rank is indicated by the ranks 1A (presumed extinct in California), 1B (rare or endangered in California and elsewhere), 2 (rare or endangered in California but more common elsewhere), 3 (more information needed, a review list), and 4 (limited distribution). In cases where the CNPS has further identified the specific threat to the species, a decimal or Threat Code is added: .1 (seriously endangered in California), .2 (fairly endangered in California), or .3 (not very endangered in California).

The following special-status plant taxa have been reported or have the potential to occur within the SEA, based on known habitat requirements and geographic range information:

- Norris’ beard moss (\textit{Didymodon norrisii}) RPR 2.2
- Sonoran maiden fern (\textit{Thelypteris puberula var. sonorensis}) RPR 2.2
- Braunton’s milk-vetch (\textit{Astragalus brauntonii}) FE, RPR 1B.1
- Nevin’s barberry (\textit{Berberis nevinii}) FE, SE, RPR 1B.1
The following vertebrate species are state and/or federally-listed as endangered or threatened, and have the potential to occur in the SEA:

- Round-leaved filaree (*California macrophylla*) RPR 1B.1
- Peirson’s morning-glory (*Calyxstopia peirsonii*) RPR 4.2
- Southern tarplant (*Centromadia parryi ssp. australis*) RPR 1B.1
- San Fernando Valley spineflower (*Chorisanthe parryi var. fernandina*) FC, SE, RPR 1B.1
- Santa Susana tarplant (*Deinandra minthornii*) Rare, RPR 1B.2
- San Gabriel bedstraw (*Galium grande*) RPR 1B.2
- Palmer’s grapplinghook (*Harpagonella palmeri*) RPR 4.2
- Newhall sunflower (*Helianthus inexpectatus*) RPR 1B.1
- Los Angeles sunflower (*Helianthus nuttallii ssp. parishii*) RPR 1A
- Mesa horkelia (*Horkelia cuneata ssp. puberula*) RPR 1B.1
- Coulter’s goldfields (*Laselnetus glabrata ssp. coulteri*) RPR 1B.1
- Davidson’s bushmallow (*Malacothamnus davidsonii*) RPR 1B.2
- Mud nama (*Nama stenocarpum*) RPR 2.2
- Moran’s navarretia (*Navarretia fossalis*) FT, RPR 1B.1
- Ojai navarretia (*Navarretia ojaiensis*) RPR 1B.1
- White rabbit-tobacco (*Pseudognaphalium leucocephalum*) RPR 2.2
- Chaparral ragwort (*Senecio aphanactis*) RPR 2.2
- Great’s aster (*Symphyotrichum greatae*) RPR 1B.3
- Slender mariposa lily (*Calochortus clavatus var. gracilis*) RPR 1B.2
- Late-flowered mariposa lily (*Calochortus fimbriatius*) RPR 1B.2
- Plummer’s mariposa lily (*Calochortus plummerae*) RPR 1B.2
- Chaparral nolina (*Nolina cismontana*) RPR 1B.2
- California Orcutt grass (*Orcuttia californica*) FE, SE, RPR 1B.1

**Sensitive Animal Species**

The following vertebrate species are state and/or federally-listed as endangered or threatened, and have the potential to occur in the SEA:

- Riverside fairy shrimp (*Streptocephalus woottoni*) FE
- Unarmored threespine stickleback (*Gasterosteus aculeatus williamsoni*) FE, FSS, SE, CDFG Fully Protected
- Arroyo toad (*Anaxyrus californicus*) FE, SSC
- California red-legged frog (*Rana draytonii*) FT, SSC
- Sierra Madre yellow-legged frog (*Rana muscosa*) FE, FSS, SSC
- Western spadefoot (*Spea hammondii*) BLMS, SSC
- Silvery legless lizard (*Anniella pulchra pulchra*) FSS, SSC
- Coastal whiptail (*Aspidoscelis tigris stejnegeri*) CDFG Special Animals List
- Rosy boa (*Charina trivirgata*) BLMS, FSS
- San Bernardino ringneck snake (*Diadophis punctatus modestus*) FSS
- Western pond turtle (*Emys marmorata*) BLMS, FSS, SSC
- San Diego mountain kingsnake (*Lampropeltis zonata pulchra*) FSS, SSC
- Coast horned lizard (*Phrynosoma blainvillii*) BLMS, FSS, SSC
- Coast patch-nosed snake (*Salvadora hexalepis virgulitea*) SSC
- Two-striped garter snake (*Thamnophis hammondii*) BLMS, FSS, SSC
- Cooper’s hawk (nesting) (*Accipiter cooperi*) CDFG Watch List
- Tricolored blackbird (nesting colony) (*Agelaius tricolor*) BCC, BLMS, SSC, USBC, AWL, ABC
- Southern California rufous-crowned sparrow (*Aimophila ruficeps canescens*) CDFG Watch List
• Grasshopper sparrow (Ammodramus savannarum) CDFG Special Animals List
• Bell’s sage sparrow (Amphispiza belli belli) BCC, CDFG Watch List
• Golden eagle (nesting and wintering) (Aquila chrysaetos) BCC, BLMS, CDFG Watch List, CDFG Fully Protected, CDF
• Burrowing owl (burrow sites) (Athene cunicularia) BCC, BLMS, SSC
• Western yellow-billed cuckoo (nesting) (Coccyzus americanus occidentalis) FC, BCC, FSS, SE
• Yellow warbler (nesting) (Dendroica petechia brewsteri) SSC
• White-tailed kite (nesting) (Elanus leucurus) CDFG Fully Protected
• California horned lark (Eremophila alpestris actia) CDFG Watch List, LAA (full species, coastal slope)
• California condor (Gymnogyps californianus) FE, SE, CDF, CDFG Fully Protected, USBC, AWL, ABC
• Yellow-breasted chat (nesting) (Icteria virens) SSC
• Loggerhead shrike (nesting) (Lanius ludovicianus) BCC, SSC, LAA (coastal slope wintering)
• Coastal California gnatcatcher (Polioptila californica californica) FT, SSC, USBC, AWL, ABC
• Bank swallow (nesting) (Riparia riparia) ST
• Least Bell’s vireo (Vireo bellii pusillus) FE, BCC, SE, USBC, AWL, ABC
• Pallid bat (Antrozous pallidus) FSS, BLMS, SSC, WBWG High
• Spotted bat (Euderma maculatum) BLMS, SSC, WBWG High
• Western mastiff bat (Eumops perotis californicus) BLMS, SSC, WBWG High
• Silver-haired bat (Lasionycteris noctivagans) WBWG Medium
• Western red bat (Lasiurus blossevillii) FSS, WBWG High
• Hoary bat (Lasiurus cinereus) WBWG Medium
• San Diego black-tailed jackrabbit (Lepus californicus bennettii) SSC
• California leaf-nosed bat (Macrotus californicus) FSS, SSC, WBWG High
• South coast marsh vole (Microtus californicus stephensi) SSC
• Western small-footed myotis (Myotis ciliolabrum) BLMS, WBWG Medium
• Yuma myotis (Myotis yumaensis) BLMS, WBWG Low–Medium
• San Diego desert woodrat (Neotoma lepida intermedia) SSC
• Southern grasshopper mouse (Onychomys torridus ramona) SSC
• Los Angeles pocket mouse (Perognathus longimembris brevinasus) FSS, SSC
• American badger (Taxidea taxus) SSC

**Ecological Transition Areas (ETAs)**

There are no ETAs designated within this SEA.

**Regional Biological Value**

The SEA meets several SEA designation criteria and supports many regional biological values. Each criterion and how it is met described below.

<table>
<thead>
<tr>
<th>Criterion</th>
<th>Status</th>
<th>Justification</th>
</tr>
</thead>
<tbody>
<tr>
<td>The habitat of core populations of endangered or threatened</td>
<td></td>
<td>Most of the SEA has critical habitat for the coastal California gnatcatcher. A population of the Braunton’s</td>
</tr>
<tr>
<td>Criterion</td>
<td>Status</td>
<td>Justification</td>
</tr>
<tr>
<td>--------------------------------------------------------------------------</td>
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</tr>
<tr>
<td>A) plant or animal species.</td>
<td>Met</td>
<td>milkvetch has critical habitat in the Simi Hills part of the SEA. The SEA has robust populations of rare plants, such as the Plummer’s mariposa lily and the Santa Susana tarweed.</td>
</tr>
<tr>
<td>On a regional basis, biotic communities, vegetative associations, and</td>
<td>Met</td>
<td>The SEA contains habitat of the extremely rare Santa Susana tarplant. In addition, several plant communities within the SEA are CDFG highest inventory priority communities due to their restricted distribution in the Southern California region. These communities include: coastal sage scrub, alluvial scrub, valley oak woodland, valley oak savannah, mainland cherry woodland, native grassland, southern willow scrub, and cottonwood-willow riparian forest.</td>
</tr>
<tr>
<td>E) Biotic resources that are of scientific interest because they are</td>
<td>Met</td>
<td>The SEA contains several populations that are unusual or at the extreme ends of their distributions: Douglas-fir, both big cone and the Douglas-fir common to the north, and coastal California gnatcatcher at its western extent. Several unusual vegetation alliances are in the Mountains, for example groves of walnuts and flowering ash. Flowering ash are uncommonly tall. The Santa Susana Mountains contain some representatives of the desert Palmer’s oak, which is unusual in the County.</td>
</tr>
<tr>
<td>Areas that would provide for the preservation of relatively</td>
<td></td>
<td>The relatively undisturbed nature and large size of the plant communities within the Santa Susana Mountains</td>
</tr>
<tr>
<td>Criterion</td>
<td>Status</td>
<td>Justification</td>
</tr>
<tr>
<td>--------------------------------------------------------------------------</td>
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<td>-------------------------------------------------------------------------------</td>
</tr>
<tr>
<td>F) undisturbed examples of the original natural biotic communities in the County.</td>
<td>Met</td>
<td>and Simi Hills provides many undisturbed examples of native, natural communities within the County.</td>
</tr>
</tbody>
</table>

In conclusion, the area is an SEA because it contains: A) core habitats of listed species; B-C) biotic communities, vegetative associations, and habitat of plant and animal species that are restricted in distribution in the County and regionally; D) a very essential migration corridor, which is limited in availability in the County; E) unusual populations at the extreme ends of their distributions that are of scientific interest; and F) areas that provide for the preservation of relatively undisturbed examples of original natural biotic communities in the County.

23. Santa Susana Mountains and Simi Hills SEA Sources


County of Los Angeles, Department of Regional Planning. 1993. *Additional Information and Analysis Regarding the Environmental Impact Report for the Sunshine Canyon Landfill Extension*, Los Angeles County, California.

County of Los Angeles, Department of Regional Planning. 2006. *The Santa Susana Mountains- Simi Hills SEA Description*, Los Angeles County, California.


**Studio Site, 23747, The Old Road, Unincorporated Area of Newhall, Los Angeles County, California**

Henrickson, James, PhD. 1996. *Biological Constraints Analysis Zone Change – Conditional Use Permit 96-113, 22925 Coltrane Avenue, Within SEA No. 20, Santa Susana Mountains, Los Angeles County, California.*

Henrickson, James, PhD., Independent Environmental Consultants. 1992. *Biological Constraints Analysis of Tentative Minor Land Division Map No. 23217, in Buffer Zone of SEA No. 23, Soledad Canyon, Santa Clara River, Los Angeles County, California.*


