4. Revisions to the Draft EIR

In accordance with Section 15132 of the CEQA *Guidelines*, this section presents the changes that were made to the Draft EIR to clarify or amplify its text in response to comments. Such changes are insignificant as the term is used in Section 15088.5(b) of the State CEQA *Guidelines*.

Executive Summary

Page ES-12, under 2.1 Alternatives Fully Evaluated in the EIR, "Jamacha Valley 138 kV/69 kV Underground Alternative," Rationale for Full Analysis —

During operation, there would be reduced levels of maintenance activities as well as potential for electricity service disruption associated with fire and weather events since the circuits would be underground and protected from the environment. In addition, this alternative would slightly decrease corona noise levels along the ROW as a result of undergrounding the 138 kV and 69 kV circuits along Willow Glen Drive.

Page ES-13, under 2.1 Alternatives Fully Evaluated in the EIR, "City of Santee 138 kV/69 kV Underground Alternative," Rationale for Full Analysis —

During operation, there would be reduced levels of maintenance activities as well as a reduced potential for electricity service disruption associated with fire and weather events since the circuits would be underground and protected from the environment. In addition, this alternative would slightly decrease corona noise levels along the ROW as a result of undergrounding the 138 kV and 69 kV circuits along Willow Glen DrivePrincess Joann Road. Therefore, because this alternative meets the project objectives, is feasible, and would lessen long-term and permanent environmental impacts, the City of Santee 138 kV/69 kV Underground Alternative is retained for full analysis in the EIR.

Page ES-14, under 2.1 Alternatives Fully Evaluated in the EIR, "City of Santee 230 kV Overhead Northern ROW Boundary Alternative," Alternative Description —

Alternative Description. This alternative was proposed based on input from residents of the City of Santee that the circuits should be moved to the northern side of the existing SDG&E ROW, further from the existing residents. Under this alternative, the 230 kV circuit would parallel the existing northern ROW boundary (approximately 35 feet north of the existing northern boundary) between the water tanks to the east of Princess Joann Road and a point approximately 800 feet northwest of the western end of Princess Joann Road. The alternative would require an approximately 50-foot wide expansion of the 150-foot ROW and the acquisition of land to the north. Under this alternative, the proposed wood and steel poles associated with the Proposed Project would be moved further away from residents who reside adjacent to the southern boundary of the ROW.

Page ES-29, under ES.3 Environmental Impacts and Mitigation Measures, insert before Mitigation Measures —

Cumulative Impacts. As defined in CEQA Guidelines Section 15355, "a cumulative impact consists of an impact which is created as a result of a combination of the [Proposed Project] together with other projects causing related impacts." As discussed above, the impact assessment methodology includes the consideration of cumulative impacts (CEQA Guidelines Section 15130). Therefore, each individual issue area within the EIR evaluated the effect of over 40 past, present, and probable future projects in conjunction with the Proposed Project. Overall, in every issue area, cumulative impacts were found to be less than significant and no Class I (significant, unmitigable) impacts were found.

Page ES-30, under ES.3 Environmental Impacts and Mitigation Measures, Mitigation Measures —

The major findings of the EIR analysis are summarized below according to resource issue area. Regulatory issues pertinent to each resource are identified, along with a summary of the primary Class I (sig-

nificant, unmitigable) and Class II (significant, mitigable) impacts that would be expected from the construction and operation of the Proposed Project. Comparative effects of the alternatives are also provided. Impact findings and mitigation measures for the Proposed Project and alternatives are summarized in Tables ES-5 and ES-6, at the end of this Executive Summary.

Page ES-45, under 3.8.3 EMF Issues, Jamacha Valley Overhead A Alternative —

Jamacha Valley Overhead A Alternative. Magnetic field levels along the western edge of the existing ROW in the Jamacha Valley would not be substantially reduced, and levels along the eastern edge of the ROW would be increased by roughly 40 percent because of locating the 138 kV and 69 kV circuits near the eastern edge: they would increase decrease from 21.6 mG with the Proposed Project to 21.4 mG under this alternative (at west edge of ROW) and increase from 10.2 mG to 14.7 mG (east edge).

A. Introduction/Overview

Page A-4, under A.3 San Diego Wildfires of 2003 —

Summary of the San Diego Wildfires. During late October and early November 2003, large wildfires burned record acreages in California. In southern California, major contributing factors in the outbreak of large wildfires were dry conditions, Santa Ana winds, and large amounts of available fuel (e.g., dead and dormant vegetation). Within San Diego County, three fires, the Paradise, Otay, and Cedar Fires, broke out during the week of October 26, 2003. The Paradise Fire was located in the Valley Center area to the east-northeast of the City of Escondido and resulted in 24 injuries and two deaths and destroyed 413 structures and 406 vehicles (SBFIJIC, 2003). The Paradise Fire destroyed approximately 56,700 acres overall. The Otay Fire burned more than 46,000 acres in the area around the City of Otay MesaChula Vista. [...]

Page A-8, in Table A-2, Permits Required for the Miguel-Mission Project. Displaying only the affected row —

Table A-2. Permits Required for the Miguel-Mission Project			
Permits	Agency	Jurisdiction/Purpose	
Local Agencies			
Habitat Conservation Plan (HCP) Site Activity Permit or Section 4d Habitat Loss Permit	San Diego County	For biological impacts to sensitive habitats	

B. Description of Proposed Project

Page B-9, in Table B-1, Summary of Project Components. Changes for "Relocate Existing 138 $kV/69\ kV$ Circuit." Displaying only affected row.

Table B-1. Summary of Project Components

Transmission System Modifications				
		Transmissi	Total Miguel to	
Transmission Circuits	Project Components	Miguel Substation to Fanita Junction	Fanita Junction to Mission Substation*	Mission Substation
Relocate Existing 138 kV/69 kV Circuit	Length of new line	24 miles	NA	24 miles
138 kV/69 kV Circuit	New 138 kV/69 kV steel pole structures	94 - <u>95</u> poles	NA	94 <u>95</u> poles
	New 138 kV/69 kV wood pole structures	44- <u>17</u> poles	NA	14- <u>17</u> poles

Page B-10, under B.2.3 Project Route —

Between Granite Hills and La Cresta Road, the project ROW heads in a northerly direction along a ridge, passing residences along Camino Monte Sombra and Calle de la Sierra Roads. North of La Cresta Road, the ROW continues along a ridgeline that passes between an avocado grove on the east, and the community of Lakeview on the west. After the ROW crosses Interstate 8, it proceeds northwest and parallels Lake Jennings Park Road where it runs through adjacent to the community of Lakeside. Near the R.M. Levy Water Treatment Plant, the ROW crosses Lake Jennings Park Road just south of the Los Coches Substation.

Page B-10, under B.2.5 Structures —

As described in Table B-1, 94-95 steel and 14-17 wood poles would be installed between Miguel Substation and Fanita Junction. Figures B-5 and B-6 illustrate typical steel poles that will be installed. Dead-end poles are used at locations where the transmission line changes direction or ends; a tangent pole is used in areas where the transmission line is constructed in a straight line. Table B-3 defines the proposed structure types and heights for each pole for the relocated 138 kV/69 kV line. Refer to Appendix 1 for maps of proposed pole locations.

Page 15, in Table B-3. Displaying only the affected rows below —

Table B-3. Proposed 138 kV/69 kV Structure Types and Approximate Heights (also see Appendix 1)

Structure	Structure Type	Total Height
79 <u>5</u> 4	Wood Pole	<u>60</u> 75
796	Wood Pole	<u>60</u>
797	GOAB Steel Dead End	75 71
<u>797S</u>	Steel Tangent	<u>75</u>
1101	Tangent Wood Pole	85 75
<u>1105</u>	Wood Pole	<u>65</u>
111 <u>1</u> 0	Full Steel Dead End	<u>61</u> 76

Page B-15, under B.3 Existing and Proposed Infrastructure —

B.3.1 Subsection A: Miguel Substation to Proposed 138 kV Pole #752 (Near Dehesa Road)

Page B-15, under B.3.1 Subsection A: Miguel Substation to Proposed 138 kV Pole #752 (Near Dehesa Road) —

Proposed Relocation. As shown in Figure B-8a, one new pole alignment would be constructed 12 feet from the western edge of the existing ROW in order to support the existing 69 kV circuit (TL 632) and 138 kV circuit (TL 13824), which would be relocated from their current position to provide an opening for the new 230 kV circuit. A total of 3942 138 kV poles would be installed along this segment (proposed 138 kV poles #10 through #752). TL 632 would be installed on the west side of each wood or tower structure, while TL 13824 would be installed on the east side of each wood or tower structure. As shown in Figure B-8b, the new pole alignment would cross over to a centered position between the two existing alignments of steel lattice towers at proposed 138 kV pole #282 (see Appendix 1). As shown in Figure B-8c, the new 138 kV/69 kV pole alignment remains in the center position after the 69 kV circuits leave the ROW.

Page B-16, under B.3.2 Subsection B: Proposed 138 kV Pole #752 (Near Dehesa Road) to #1110 (Near R.M. Levy Water Treatment) —

Proposed Relocation. As shown in Figures B-9a and B-9b, in order to create an opening for the new 230 kV circuit, a new 138 kV and 69 kV pole alignment would be constructed in the center of the existing ROW to support the relocation of the 69 kV (TL 632) and 138 kV circuits (TL 13824). A total of 28-22 138 kV wood poles would be installed along this segment (proposed 138 kV pole #792 through #1110).

Page B-28, under B.3.3 Subsection C: Proposed 138 kV Pole #1110 (Near R.M. Levy Water Treatment Plant) to Los Coches Substation —

Proposed Relocation. As shown in Figure B 10, a new pole alignment would be constructed in a centered position between the two main existing steel lattice tower alignments in order to support the relocated 69 kV circuit (TL 632) and the relocated 138 kV circuit (TL 13824). Two 138 kV poles would be installed along this segment (proposed 138 kV poles #1120 and #1130). This new pole alignment would remain in a centered position until it reaches the Los Coches Substation. The 69 kV circuit (TL 632) would occupy the west side of each new pole, while the 138 kV circuit (TL 13824) would occupy the east side of each new pole In this segment, the 138 kV/69 kV circuits would remain on the west side of the right-of-way on existing lattice towers.

As shown in Figure B-10, tThe new 230 kV circuit would then be installed on either the modified steel lattice tower structures or on replacement 230 kVtwo new steel pole structures next to two sets of existing lattice towers as the ROW approaches Los Coches Substation. Five steel lattice structures would be modified that include: #675935, #675934, #675933, #678024, and #678023. The new 230 kV circuit would occupy a position on the west side of each modified or replacement structurethe new poles, while the east side of each structurethe new poles would remain vacant for a future tie line. The new steel pole closest to Los Coches Substation would be installed on the east side of the existing 230 kV circuit lattice tower #971900 and the existing 230 kV circuit wires would be transferred to the new steel pole.

Page B-29, under B.3.4 Subsection D: Los Coches Substation to Proposed 138 kV Pole #1160 (Near Willow Road) —

The new 230 kV circuit would then be installed on either the existing but modified 138 kV and 69 kV steel lattice tower structures or on replacement 230 kV steel pole structures. Three The new steel pole structures would replace steel lattice structures would be modified:towers #576669, #576668, and #576667. The new 230 kV circuit would occupy a position on the west side of each modified or replacement structurenew steel pole, while the east side of each structure new pole would remain vacant for a future tie line.

Page B-29, revised title for Section B.3.5 —

B.3.5 Subsection E: Proposed 138 kV Pole #1160 (Near Willow Road) to Pole #1170 Fanita Junction

Page B-29, under B.3.5 Subsection E: Proposed 138 kV Pole #1160 (Near Willow Road) to Pole #1170 Fanita Junction —

• 138 kV and 69 kV Circuits: The existing tower alignment supporting the 138 kV and 69 kV circuits is located 50 feet from the southern edge of the existing ROW. There are currently 24 138 kV steel lattice structures (existing Towers #576666 through #576643). The existing 138 kV circuit (TL 13819) is on the south side of each tower, and existing 69 kV circuits (TL 636) currently occupy the north side of each tower. The 138 kV circuits (TL 63613819) exits the ROW at proposed 138 kV an existing pole near proposed pole #1285 and 138 kV circuit (TL 13821) comes back into the ROW at an existing pole near proposed and come back into the ROW at pole #1315.

Page B-31, under B.3.5 Subsection E: Proposed 138 kV Pole #1160 (Near Willow Road) to Pole #1170 Fanita Junction —

Proposed Relocation. As shown in Figure B-12 in Subsection E, the existing 138 kV and 69 kV circuits would be removed from their current location and be relocated onto a new pole alignment, which would be constructed 12 feet from the southern edge of the existing ROW. A total of 29 138 kV poles would be installed along this segment (proposed 138 kV pole #1170 through #1410). The two-69 kV circuits would occupy a position on the north side of each new pole, while the 138 kV circuit would occupy the south side of each new pole.

Following the relocation of the existing 69 kV circuits and 138 kV circuit, the new 230 kV circuit would then be installed on either the modified steel lattice tower structures or on replacement 230 kV steel pole structures. A total of 24–13 steel lattice structures would be modified and 10–12 would be replaced with a steel mono-pole. The 10 steel lattice towers that would be replaced include: #576663, #576661, #576660, #576658, #576657, #576656, #576653, #576648, #576644, and #576643. The new 230 kV circuit would occupy a position on the south side of each modified or replacement structure, while the north side of each structure would remain vacant for a future tie line. In addition, SDG&E plans to install a-two new 230 kV steel poles (#871862) at Fanita Junction.

Page B-31, under B.3.6 Subsection F: Fanita Junction to Mission Substation —

• 230 kV Circuits: The tower alignment supporting the single 230 kV circuit (TL 23022) is located 95 feet west of the 138 kV tower alignment, and 55 feet from the western edge of the existing ROW. There are currently 41 230 kV steel pole structures (existing poles #873104 through #873068,

#731172, #731171, #579862, and #579861) located along this segment. For several spans Tthe 230 kV circuit (TL 23022) occupies a position on the west side of each structure the current lattice towers, while the east side of each structure tower is vacant. The 230 kV structures in this alignment heading southwest from Fanita Junction are steel lattice and steel pole structures. The existing 230 kV circuit occupies both sides of the steel poles.

Page B-38, under B.4.2.1 Miguel Substation to Fanita Junction, "Relocate the 138 kV and 69 kV Circuits" —

Modifications to the existing lattice towers would involve replacing the existing structural arms with a horizontal-post brace insulator configuration to handle the 230 kV circuit, and either adding or modifying structural steel members to strengthen the lattice towers. The conductors for the proposed new 230 kV circuit would be installed on the <u>east-west</u> side of the modified lattice towers or replacement poles, leaving the <u>west-east</u> side of the lattice structures vacant for a possible future circuit. Depending on accessibility, either a flatbed truck or helicopter would be used to transport steel members to the structure sites. Typically, the replacement steel members would be assembled on the ground and lifted into place by either a helicopter or crane.

Page B-39, under B.4.2.1 Miguel Substation to Fanita Junction, "Right-of-Way Cleanup and Site Restoration" —

Restoration efforts would include preemptive measures that would be carried out prior to and during construction, such as separating topsoil from the subsoil and storing the topsoil so that it can be replaced after construction, salvaging protected plants and using staked hay bales and silt fences to control erosion and water runoff. Erosion control would be achieved by the best management practices in the Storm Water Pollution Prevention Plan (SWPPP) that SDG&E would implement for the Proposed Project further mitigated pursuant to PP-55, which requires the preparation and implementation of an Erosion Control and Sediment Transportation Control Plan that must be submitted to San Diego County for review and comment at the same time the grading plans for the project are submitted.

Page B-41, under B.4.5 Materials and Staging Areas, inserted after bullets —

However, prior to delivery of materials and equipment, some of these sites may be shifted to sites that lessen inconvenience to residents and/or improve efficiencies for construction personnel and would have the same or less biological impacts as the identified sites.

Page 43, in Table B-5. Protocols for Each Issue Area, change for Cultural Resources. Displaying only affected ROW -

Table B-5. Protocols for Each Issue Area		
Issue Area	Protocols	
Cultural Resources	7, <u>15, 17,</u> 39, 40, 41, 53, 63	

C. Alternatives

Page C-10, under C.4.2.1 Jamacha Valley 138 kV/69 kV Underground Alternative —

• Cultural Resources. Eight identified cultural resources sites are located within the Proposed Project ROW between the intersection of Willow Glen Drive and the Miguel Mission ROW and Dehesa Road. This alternative would avoid these eight known cultural resources sites.

Page C-35, under C.4.2.4 City of Santee 138 kV/69 kV Underground Alternative, "Rationale for Full Evaluation." Replace Biological and Cultural Resources —

• **Biological Resources**. This route has the potential to reduce temporary and permanent impacts to biological resources (e.g., coastal sage scrub) because construction would occur in city streets and not within the ROW.

Page C-35, under C.4.2.5 City of Santee 230 kV Overhead Northern ROW Boundary Alternative, Description —

This alternative was proposed based on input from residents of the City of Santee that the circuits should be moved to the northern side of the existing SDG&E ROW, further from the existing residences. As a result, two overhead options were evaluated within the City of Santee. The two options included placing either the proposed 230 kV circuit or the existing 138 kV/69 kV circuits on steel poles on the northern side of the ROW. Both circuits would follow the same route through this segment of the Miguel-Mission ROW. Under both options, the circuits would be moved to the north side of the existing ROW between the water tanks (approximately 1,450 feet due east of the eastern end of Princess Joann Road). In order to transition the circuits to the north side of the ROW, SDG&E would need to install an additional pole on the northern edge of the ROW, near the water tanks to the east of Princess Joann Road. From proposed Pole #1300 (see EIR Appendix 1), the circuits would head north and pass over/under the two existing 230 kV circuits to a new pole located on the north side of the ROW. The circuits would then head west paralleling the northern boundary (25 to 35 feet north of the existing northern boundary) of the ROW until a point approximately 800 feet northwest of the western end of Princess Joann Road, where the circuits would pass over/under the existing 230 kV circuits to a new pole located on the south side of the ROW and reconnect with the Proposed Project to Mission Substation. Construction of either option along the northern ROW boundary would require an approximately 50-foot wide expansion of the 150-foot ROW and the acquisition of land to the north. See Figures C-6a and C-6b for an illustration of the City of Santee 230 kV Overhead Northern ROW Boundary Alternative. The two options are: [...]

Page C-36, under C.4.2.5 City of Santee 230 kV Overhead Northern ROW Boundary Alternative —

Feasibility: [. . .] Although there are risks of outages with crossings, the crossings would be compliant with all design standards, which would take into account line sag and swing from wind, and minimize the risks. Therefore, the alternative is still considered to have acceptable reliability.

Page C-54, under C.5.4.1 Renewable Resource Alternatives —

Potential New Impacts Created. While solar generation facilities do not generate air emissions (unless they operate with a fossil fuel component) and have relatively low water requirements, there are other potential impacts associated with their use. Construction of solar thermal plants can lead to habitat destruction and visual impacts. PV systems can also have negative visual impacts, especially if ground-mounted. Furthermore, PV installations are highly capital intensive, and manufacturing of the panels generates some hazardous wastes that could pose an occupational hazard. In addition, use of wind solar resources would still require new transmission lines to be constructed with impacts similar to or greater than the Proposed Project.

D.2 Air Quality

Page D.2-5, in Table D.2-2. Notable Generation Sources in Miguel-Mission Project Area. Displaying first 5 data rows. —

Power Plant	Location	Type of Facility	Available Rating (MW)*	NOx Emissions (lb/MW-hr)*	PM ₁₀ Emissions (lb/MW-hr)*	CO Emissions (lb/MW-hr)*
Existing Major Power Plant	s					
Duke – South Bay	Chula Vista	Multi-fuel boiler/turbine	693	0.44 est.	0.07	1.59
SDG&ECabrillo Power – Encina	Carlsbad	Multi-fuel boiler/turbine	965	0.37 est.	0.06	0.84
SCE – San Onofre	San Onofre	Nuclear	2150	0.002	<0.001	0.001
Existing Peaker Plants						
Intergen Wildflower – Larksp	ur Otay Mesa	Gas-fired turbine	90	0.17	0.07	0.12
Intergen-Wildflower - Larksp	ur Otay Mesa	Liquid-fuel backup	90	0.36	0.29	0.12

Page D.2-8, under D.2.3.1 Definition and Use of Significance Criteria —

To determine whether a significant impact would occur during construction, the SDAPCD informally recommends quantifying construction emissions and comparing them to thresholds found in the SDAPCD regulations for stationary sources. If emissions during project construction could exceed the thresholds that apply to stationary sources, then construction activities could have the potential to violate air quality standards or contribute substantially to existing violations. Emissions from project operations may also be quantified and compared to thresholds. The stringent recommendations of the South Coast Air Quality Management District are used here in lieu of specific recommendations from because SDAPCD has not provided specific recommendations for the post-construction phases. Total operational emissions for comparison with these thresholds includes all emissions from motor vehicle use and stationary sources associated with the project. The significance thresholds are shown in Table D.2-5.

Page D.2-11, under Impact A-3: Power Generated During Transmission Line Operation Would Cause Emissions from Power Plants —

Growth in electricity demand, although unrelated to the Proposed Project, could result in new power plant emissions in the future. Emissions from foreseeable future power generation within California would be subject to local air pollution control district requirements and CEQA. This means that domestic power plant emissions would likely be publicly reviewed and mitigated to avoid significant impacts and ensure consistency with local air quality management goals and attainment plans. Other discretionary projects in the U.S. related to obtaining power from Mexico would similarly be subject to

Information related to the California Power Plant and Energy Facilities Licensing Process is publicly available at http://www.energy.ca.gov/sitingcases/index.html. For example see: California Energy Commission, Final Decision, Otay Mesa Generating Project, April 2001 (Docket No. 99-AFC-5).

the requirements of the National Environmental Policy Act (NEPA process). For example, on May 5, 2004, the U.S. Department of Energy issued a Draft Environmental Impact Statement for international transmission lines from the Imperial Valley Substation to power plants in Mexicali. There is no final decision on this environmental assessment, but the proposed action would be to permit the transmission lines without additional offsets of air emissions from the power plants.

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Information related to the U.S. Department of Energy NEPA review process for transmission lines across the U.S. border with Mexico is publicly available (FE Docket Nos. PP-234 and PP-235). For example see: Environmental Assessment for Presidential Permit Applications for Baja California Power, Inc. and Sempra Energy Resources, December 2001 (DOE/EA-1391). Also: Notice of Intent to Prepare an Environmental Impact Statement (Vol. 68, Federal Register, p. 61796, October 30, 2003).

Notice of Availability of Department of Energy's Draft Environmental Impact Statement (Vol. 69, Federal Register, p. 26089, May 11, 2004).

D.3 Biological Resources

Page D.3-8, under D.3.1.4 Special Status Plant and Animal Species within the Project Area —

• USFWS protocol surveys were conducted for the endangered quino checkerspot butterfly and the threatened coastal California gnatcatcher as these species occur in the area. Non-protocol surveys for the endangered San Diego fairy shrimp were conducted. No quino checkerspot butterfly were observed within the project area during the protocol-level surveys in 2002 or 2003. A single, adult male quino checkerspot butterfly, however, was incidentally observed within the project area, likely dispersing through the area, during a 2003 rare plant survey as shown on Figure 4-7 of the biological technical report (see EIR Appendix 3) (RECON, 2004). San Diego fairy shrimp were observed in several vernal pools and access road depressions as shown in Figures 4-35 and 4-37 through 4-40 of the biological technical report (see EIR Appendix 3) (RECON, 2004). Several coastal California gnatcatchers were observed within the project area during protocol-level surveys in 2002 and 2003 as shown in many of the figures found in the biological technical report (RECON, 2004).

Page D.3-12, under D.3.1.5 Sensitive Biological Resources Documented in Project Area, "Miguel Substation to Los Coches Substation" —

Sensitive animal species observed within this segment of the project area include: coastal California gnatcatcher, Cooper's hawk, southern California rufous-crowned sparrow, grasshopper sparrow, northern harrier, least Bell's vireo, coastal cactus wren, San Diego black-tailed jackrabbit, southern mule deer, quino checkerspot butterfly (an incidental sighting), San Diego horned lizard, and orange-throated whiptail.

Page D.3-15, under D.3.2.3 Regional Policies, Plans, and Regulations —

SDG&E Natural Community Conservation Plan. In December 1995, USFWS and CDFG approved SDG&E's Subregional Natural Community Conservation Plan (NCCP) that addresses potential impacts to sensitive resources associated with SDG&E's ongoing installation, use, maintenance, and repair of its gas and electric systems and typical expansion to those systems throughout much of SDG&E's existing service territory. As a part of the NCCP, SDG&E has been issued an incidental take permit (Permit PRT-809637) by USFWS and CDFG for 110 covered species. The NCCP was developed following the multiple species and habitat conservation planning approach. The NCCP includes mitigation measures and operational protocols designed to avoid potential impacts and to provide appropriate mitigation where such impacts are unavoidable to ensure the protection and conservation of listed and covered species. These Operational Protocols are in an attachment to the NCCP. The project falls within the area where SDG&E's utility operations are governed by the NCCP, with the exception of the areas on MCAS Miramar, including areas within the County of San Diego, Cities of San Diego and Santee, and MCAS Miramar. For this project, SDG&E has adopted the mitigation measures and operational protocols contained in the NCCP as well as project-specific protocols.

Page D.3-21, in Table D.3-4, Project Protocols —Biological Resources, change in PP-34. Displaying only the affected row —

Table D	Table D.3-4. Project Protocols – Biological Resources			
PP No.	Description			
34	In areas where soils and vegetation are particularly sensitive to disturbance—(as defined in this PEA), existing access roads would be repaired only in areas where they are otherwise impassable or upsafe.			

Page D.3-27, under Impact B-2: Impacts to Sensitive Plant Species —

Temporary impacts to the following sensitive plant species are not anticipated, but have the potential to occur: San Diego ambrosia and San Diego barrel cactus, as discussed below. RECON conducted a spring survey for San Diego ambrosia on April 14, 2004. The results as shown on revised Figure 4-9 depicts an expanded population of this species. The San Diego ambrosia population is located immediately adjacent to an existing 230 kV lattice tower, an existing 69/138 kV lattice tower to be modified to 230 kV, and a proposed 69/138 kV structure. The new tower has been located to avoid significant direct impacts, and SDG&E proposes to clearly stake off these populations and avoid them during construction. As such, Nno permanent impacts would occur to any sensitive plant species.

Page D.3-27, under Impact B-2.1: San Diego Ambrosia —

San Diego ambrosia is present within the non-native grassland southeast of Willow Glen Drive and Steele Canyon Road. As shown on revised Figure 4-9 (mapping conducted April 2004) of the biological technical report (RECON, 2004), project activities would take place adjacent to the three four San Diego ambrosia patches. This species should be avoided to the maximum extent feasible. Based on the existing location of this species, no permanent impacts to the species are anticipated due to the installation of Structures #361 and #370 (RECON, 2004). These structure locations are currently 15 to 20 feet from any immediately adjacent to San Diego ambrosia plants. If the patch of San Diego ambrosia adjacent to the Structure #361 location expands and would be permanently impacted by the structure, the structure may be relocated a few feet to the north in order to prevent impacts (RECON, 2004). Impacts to the San Diego ambrosia are potentially significant (Class II), mitigable to less than significant levels with implementation of Mitigation Measure B-2a.

Page D.3-27, under Mitigation Measure for Impact B-2.1, Impacts to San Diego Ambrosia (Mitigation Measure B-2a) —

- 1. A qualified biologist shall conduct a focused survey for San Diego ambrosia in the spring of 2004, prior to the start of construction. All San Diego ambrosia locations shall be recorded using a global positioning system (GPS), and Figure 4.9 of the biological technical report (RECON, 2004) shall be updated with any new locations. In addition, tThe boundaries of all San Diego ambrosia patches shall be clearly staked and flagged during the surveys for impact avoidance during implementation of the Proposed Project.
- 2. All patches of San Diego ambrosia that are delineated shall be avoided to the maximum extent possible by any temporary soil disturbing project activities such as driving, staging, or deposition of auger spoils. If driving or staging in areas containing San Diego ambrosia is unavoidable, work shall be conducted during the fall or winter months, the species' dormant period, and plywood or a similar material shall be placed over the San Diego ambrosia plants and their surrounding area to reduce soil disturbance. Moreover, if avoidance is not feasible, the Applicant shall coordinate with the USFWS regarding Mitigation Measure B 1a as well as potential restoration/compensation measures.
- 3. Permanent impacts may take place at the locations for Structures #361 and #370. These structure locations are currently 15 to 20 feet from any immediately adjacent to San Diego ambrosia plants. If the patch of San Diego ambrosia adjacent to the Structure #361 location expands and would be permanently impacted by the structure, the structure location may be relocated a few feet to the north in order to prevent impacts. If the section of San Diego ambrosia adjacent to Structure #370 expands and would be permanently impacted by the structure, which can not be relocated due to engineering constraints, SDG&E has stated that

all work can be accomplished without direct impacts to San Diego ambrosia populations. If it is determined during construction that direct impacts cannot be avoided, the project biologist and USFWS and CDFG shall coordinate to determine suitable mitigation for the impacts.

Page D.3-28, under Impact B-3: Impacts to Vernal Pools —

The SDG&E NCCP does not cover impacts to vernal pools and vernal pool species (including the San Diego fairy shrimp) resulting from new projects, such as the Proposed Project. As a result, the Proposed Project must avoid impacts to vernal pools. However, SDG&E submitted a Minor Amendment application draft clarification to the USFWS to SDG&E NCCP that addresses impacts to vernal pools in the SDG&E NCCP(SDG&E Subregional Plan - Clarification Document, May 17, 2004; vernal pool clarification) that includes the use of existing access roads for new projects. This clarification is currently under review by USFWS and CDFG. If agreement between USFWS, CDFG and SDG&E on vernal pool clarification is reached prior to project implementation, then impacts to vernal pools resulting from the Proposed Project could be processed under the SDG&E NCCP, provided measures are consistent with the final vernal pool clarification. If the Minor Amendment for vernal pools is finalized prior to project implementation, and addresses the use of existing access roads for new projects, the Proposed Project could be processed under the plan (USFWS letter, January 6May 24, 2004). If clarification has not been finalized prior to project implementation, the following shall be implemented.

Page D.3-30, under Impact B-4.2: Coastal Cactus Wren —

Under SDG&E's NCCP, the coastal cactus wren is considered a narrow endemic and, as such, take authorization is limited to emergencies and unavoidable impacts from repairs to existing facilities. Take of the species for non-emergency work may not occur without first conferring with the USFWS and CDFG. Furthermore, for new projects, destruction of narrow endemic wildlife species or their supporting habitat areis not covered by the NCCP.

Page D.3-30, under Mitigation Measure for Impact B-4.2, Impacts to Coastal Cactus Wren (Mitigation Measure B-4b) —

2. All grading or brushing of maritime succulent scrub, habitat for the coastal cactus wren, shall be conducted from September through February, which is outside the coastal cactus wren breeding season. Grading, brushing, and any other project activity shall avoid impacting large cactus patches within proximity to coastal cactus wren populations and/or that provide suitable nesting habitat for the coastal cactus wren.

[...]

4. Consultation with USFWS and CDFG would occur in accordance with the SDG&E NCCP and is required prior to undertaking any activity that would impact nesting birds in order to agree on specific suitable actions.

Page D.3-32, under Mitigation Measure for Impact B-4.3, Impacts to Coastal California Gnatcatcher (Mitigation Measure B-4c) —

4. Consultation with USFWS and CDFG would occur in accordance with the SDG&E NCCP is required prior to undertaking any activity that would impact nesting birds in order to agree on specific suitable actions.

Page D.3-33, under Mitigation Measure for Impact B-4.4, Impacts to San Diego Fairy Shrimp (Mitigation Measure B-4d) —

4. If the alternate access route to Tower #873072 and its associated stringing site is feasible, and approval from MCAS Miramar, USFWS and CDFG is granted, this route shall be used for all project activities associated with Tower #873072 including its stringing site.

Page D.3-34, under Mitigation Measure for Impact B-4.4, Impacts to San Diego Fairy Shrimp (Mitigation Measure B-4e) —

3. The mitigation program required by USFWS and CDFG is expected to include a quantification of project impacts, a mitigation ratio of 2:1 for vernal pool surface area impacts that do not support sensitive species, a mitigation ratio of 3:1 for vernal pools that do support listed, covered, and/or sensitive species, implementation of a vernal pool restoration plan on an area with appropriate soils, and maintenance and monitoring for five years.

Page D.3-34, under Impact B-4.5: Quino Checkerspot Butterfly, add new second bullet —

• Additionally, as defined in the SDG&E NCCP Amendment, suitable QCB habitat "areas that meet the shrub cover standard are excluded if the ground cover vegetation is disturbed and/or covered by understory vegetation to the extent that larval host plants do not grow. Areas of solid rock substrate are also excluded."

Page D.3-35, under Mitigation Measure for Impact B-4.5, Impacts to Quino Checkerspot Butterfly (Mitigation Measure B-4f) —

7. If grading and grubbing activities occur during the quino checkerspot butterfly larval and adult activity season (October 16 through May 31), a qualified quino checkerspot butterfly biologist shall survey the area prior to grading activities. If the adult flight season has not begun, according to USFWS Survey Protocol (2002), a qualified larval quino checkerspot butterfly biologist shall survey the area for larval quino checkerspot butterfly prior to grading and grubbing activities. As post-diapause larvae may also be present during the adult flight season, larval surveys may also be necessary concurrent with the adult flight season. If egg clusters, larvae, and/or adults are present within the impact area, and impacts to these individuals are unavoidable, the USFWS shall be contacted to determine whether the quino checkerspot butterfly shall be salvaged or relocated.

[. . .]

10. Activities occurring at a time when diapause quino checkerspot larvae could be present shall either (1) avoid disturbance within 10 meters of primary host plants (identified during the 2004 adult flight season survey) within occupied habitat, or (2) a biologist qualified to identify diapause quino checkerspot butterfly larvae should conduct surveys within 10 meters of primary host plants prior to project activities.

Page D.3-35, under Mitigation Measure for Impact B-4.5, Impacts to Quino Checkerspot Butterfly (Mitigation Measure B-4g) —

1. A qualified botanist biologist shall identify "suitable quino habitat" any time of the year, but prior to clearing and grubbing. "Suitable quino habitat" is defined as "shrub communities such as coastal sage scrub, chaparral, and desert scrub with 50 percent shrub cover or less and the potential to support dot-seed plantain or other larval host plants" (RECON, 2000).

Page D.3-36, under Impact B-5: Impacts by Invasive Plant Species —

The project area contains several invasive species, including Russian thistle and fennel. Construction could result in the introduction of new invasive plants or the spread of existing invasive species into portions of the project area in which invasive species do not already occur. Unless properly maintained, disturbed areas can recolonize with invasive species that outcompete slower growing native species. The seeds of invasive species could be transported to other areas by the tires of trucks used during construction. Potentially significant impacts associated with the spread of noxious weeds would be reduced to less than significant levels with implementation of Mitigation Measure B-5a.

Page D.3-36, under Mitigation Measure for Impact B-5, Impacts by Invasive Plant Species (Mitigation Measure B-5a), bullets —

- Implementation of specific protective measures during construction, such as cleaning vehicles prior to off road use, using weed free imported soil, restricted vegetation removal and requiring topsoil storage
- Development and implementation of weed management procedures to monitor and control the spread of weed populations along the ROW
- Vehicles used in transmission line construction shall be cleaned prior to operation off of maintained roads
- Fill material, soil amendments, gravel, etc., required for construction/restoration activities shall be obtained from a source that can certify the soil as being "weed free"
- Existing vegetation shall be cleared only from areas scheduled for immediate construction work (within 10 days) and only for the width needed for active construction activities with one exception: If the grading within the 10-day window would occur during a time frame which prohibits grading in certain areas for specific species (e.g., coastal California gnatcatcher) then grading may occur outside the 10-day window, in which case, SDG&E would immediately implement appropriate erosion control measures and commence work as soon as possible.
- During construction, the upper 12 inches of topsoil (or less depending on existing depth of topsoil) shall be salvaged and replaced wherever the transmission line is trenched through open land (not including graded roads and road shoulders)
- Disturbed soils shall be revegetated with an appropriate seed mix that does not contain invasive, non-native plant species.

Page D.3-37, under Impact B-6: Impacts Due to Bird Electrocution and Tower/Line Collisions, "Collision" —

As previously stated, the proposed 230 kV circuits would be placed on existing 138 kV/69 kV towers and poles modified to support the 230 kV circuits. The difference in height between the proposed 230 kV circuits and the relocated 138 kV/69 kV circuits would be less than 10 feet differ by as much as 40 feet due to varying topography, as well as height differentials of structures and conductors. and therefore, would not be considered a significant impact. Although the project would introduce new wires at varying heights from what currently exist, the potential collision impact to birds is not considered significant because wires already exist in the vicinity of where the new wires will extend, and because this area is not a major flyway.

Page D.3-41, under D.3.4.1 Jamacha Valley 138 kV/69 kV Underground Alternative, "Environmental Impacts and Mitigation Measures" —

Temporary and permanent Limpacts from the Jamacha Valley 138 kV/69 kV Underground Alternative would be less than those previously described for the Proposed Project. Approximately 95.51 acres of temporary impacts and approximately 9.12 acres of permanent impacts to vegetation communities and developed land would occur if the Proposed Project were constructed with the Jamacha Valley 138 kV/69 kV Underground Alternative (Table D.3-8). Temporary impacts would require 67.46 acres of sensitive habitat to be restored and monitored after construction. Permanent impacts would require 13.2 acres of habitat to be deducted from SDG&E's mitigation credits.

Page D.3-51, in Table D.3-13 (renamed from second Table D.3-12), in Mitigation Measures B-4b and B-4c, the content at "Responsible Agency" is changed from "CPUC" to "CPUC, USFWS, and CDFG."

D.4 Cultural Resources

Page D.4-11, bullet added under D.4.3.2 Project Protocols —

The Applicant Proposed Project Protocols related to cultural resources are shown in Table D.4-3. These were outlined in the Proponent's Environmental Assessment (PEA) (SDG&E, 2002) for reducing potential impacts to cultural resources from construction. These Project Protocols are considered part of the project description when evaluating potential impacts from the Proposed Project. The key elements of the Project Protocols are:

- Avoidance of cultural resources when feasible (PP-39, PP-40, PP-41, and PP-53)
- Delineate cultural resources boundaries (PP-17)
- Monitoring construction activities (PP-53)
- Evaluation of cultural resources (PP-53)
- Mitigation of project effects when avoidance is not feasible (PP-39, PP-41, and PP-53)
- Proper treatment of human remains in accordance with federal, State, and local laws, as appropriate (PP-63)
- Providing cultural resources awareness training to project personnel (PP-7).

Page D.4-11, in Table D.4-3. Project Protocols – Cultural Resources, Protocol 17 added. Displaying only the affected row —

PP No.	Description
<u>17</u>	Prior to construction, the boundaries of plant populations designated as sensitive by USFWS or CDFG, cultural
	resources, and other resources designated sensitive by SDG&E and the resource agencies would be clearly delin-
	eated with clearly visible flagging or fencing. The flagging and fencing shall remain in place for the duration of con-
	struction. Flagged areas would be avoided to the extent practicable during construction and maintenance activities.
	Where these areas cannot be avoided, focused surveys for covered plant species shall be performed in conformance
	with Protocol 21, and the responsible resource agency(ies) would be consulted for appropriate mitigation and/or
	revegetation measures prior to disturbance. Notification of the presence of any covered plant species to be removed in
	the work area would occur within ten (10) working days prior to the project activity, during which time the USFWS or
	CDFG may remove such plant(s) or recommend measures to minimize or reduce the take. If neither USFWS nor
	CDFG has removed such plant(s) within the ten (10) working days following the written notice, SDG&E may proceed
	with the work and cause a take of such plant(s), if minimization measures are not implemented.

Page D.4-16, under Impact C-1: Construction Operations Could Affect Known Cultural Resources —

Construction operations related to access roads, work areas, staging areas, stringing sites, and substations have the potential to affect known cultural resources. Impacts could also result during construction from accidental damage. This impact is lessened by PP-39, PP-40, and PP-41, whereby SDG&E commits to designing access roads and structures to avoid cultural resources to the extent feasible, and by PP-17 and PP-53, whereby SDG&E commits to marking cultural resource boundaries and to monitoring and evaluating cultural resources during construction. However, these protocols do not reduce potential project effects below significant levels because: (1) they only imply, but do not specify avoidance of cultural resources located in staging areas, stringing sites, and substations; (2) they fail to explicitly identify the criteria for determining where monitoring shall occur; (3) they fail to specify criteria for selecting which sites will be marked to y lack a mechanism to prevent accidental damage to known cultural resources located in close proximity to construction areas; and (4) they are unclear about the timing and procedures regarding evaluation. These specific requirements are outlined in Mitigation Measures C-1a through C-1d below. This impact is potentially significant, but can be mitigated to a less than significant level (Class II) through the implementation of Mitigation Measures C-1a through C-1d.

Page D.4-17, under Mitigation Measures for Impact C-2, Construction Operations Could Affect Undiscovered Cultural Resources —

- C-2a Conduct archaeological survey. All areas subject to ground-disturbing activities that have not been previously surveyed, or where <u>initial conditions did not allow for adequate coverage</u>, should be surveyed prior to clearing or other ground-disturbing activity if current conditions allow effective survey coverage to be achieved previous surveys were inadequate due to steep slope or dense vegetation, shall be surveyed prior to clearing or other ground disturbing construction operations. ___ Upon discovery of cultural resources, the Project Protocols and mitigation measures for Impact C-1 shall be implemented.
- C-2b Conduct construction monitoring in the project area. All ground-disturbing activities in the project area, except those occurring in disturbed areas where the underlying intact sediments predate the late Pleistocene/Holocene transition, area shall be monitored. The project archaeologist shall have discretion to exclude areas from monitoring or to terminate monitoring when field conditions show a low likelihood for the presence of intact archaeological deposits. Cultural resources discovered during monitoring shall be evaluated to determine if they are historical resources or unique archaeological resources. The effects of the project on evaluated historical resources or unique archaeological resources shall be determined and appropriate mitigation measures developed and implemented. Determination of project effects shall also include effects from future maintenance operations.

Page D.4-18, under Mitigation Measures for Impact C-4, General Public May Collect or Vandalize Cultural Resources —

C-4a Install locked gates on access roads. Locked gates shall be installed on all access roads, where possible, to prevent unauthorized public vehicular traffic to areas containing cultural resources.

Page D.4-18, under D.4.4.1 Jamacha Valley 138 kV/69 kV Underground Alternative, "Environmental Setting" —

This alternative is set on the northeast side of Jamacha Valley, a wide river valley formed by the Sweetwater River. This perennial stream drains a portion of the Cuyamaca Mountains. Until recently, this stream nourished a variety of riparian and other stream-side environments that would have provided rich habitats for many plants and animals important to the lives of the Kumeyaay people. The generally wide and level valley floor would have served as a transportation corridor for the Kumeyaay during their seasonal movements from the coast to the mountains. Stream valleys such as the Jamacha Valley are magnets for people practicing a hunter-gather lifestyle, and would have been frequently visited by the Kumeyaay and their predecessors. Components of the ethnographic village of Motamo, as well as a variety of other sites, are located in the higher ground flanking the valley. Other activities undoubtedly occurred closer to the stream. The archaeological sensitivity of the area is demonstrated by the eight archaeological sites located in the 3.5-mile-long stretch of Proposed Project ROW that the existing 138 kV/69 kV circuits traverse (Table D.4-6).

Page D.4-18, added Table D.4-6, "Environmental Setting" —

Table D.4-6.	Cultural Resources Identified in the Miguel-Mission Project ROW Involving the Jamacha Valley
	138 kV/69 kV Underground Alternative

Resource	Description	CRHR Eligibility Status	Segment	
CA-SDI-4515	Habitation site	Potentially eligible	Miguel Substation to Fanita Junction	
CA-SDI-4650	Milling site	Potentially eligible	Miguel Substation to Fanita Junction	
CA-SDI-4652	Artifact scatter	Potentially eligible	Miguel Substation to Fanita Junction	
CA-SDI-4881	Habitation site	Potentially eligible	Miguel Substation to Fanita Junction	
CA-SDI-10648	Milling site	Potentially eligible	Miguel Substation to Fanita Junction	
CA-SDI-16401	Milling site	Potentially eligible	Miguel Substation to Fanita Junction	
SDM-W- 0924	Habitation site	Potentially eligible	Miguel Substation to Fanita Junction	
SDM-W-1095	Habitation site	Potentially eligible	Miguel Substation to Fanita Junction	
Source: Collett and Cheever, 2002; SDG&E, 2003c.				

Page D.4-21, under D.4.4.2 Jamacha Valley Overhead A Alternative, "Environmental Setting" —

The potential for buried prehistoric archaeological sites in the valley is high. Stream valleys are depositional environments and frequently large amounts of sediment are deposited during high-flow events. It is common to find deeply buried archaeological sites in such environments. Beginning in the Mission period and continuing into the early-to-middle twentieth century, the valley was used for ranching, farming, and other agricultural activities. Because this alternative is located in SDG&E's existing ROW, the followingthree CRHR-Eligible or Potentially CRHR-Eligible Cultural Resources sites (listed in Table D.4-5) for the Proposed Project in the ROW between the Herrick Center and Hillsdale Road would also be potentially affected by this alternative (Table D.4-7).: CA SDI 4883, CA SDI 16401, and CA SDI 4650.

Page D.4-21, added Table D.4-7, "Environmental Setting" —

Table D.4-7	'. Cultural Resources Identified in	the Miguel-Mission Pro	oject ROW Involving	the Jamacha Valley
	Overhead A Alternative	-	_	-

Resource	Description	CRHR Eligibility Status	Segment
CA-SDI-4650	Milling site	Potentially eligible	Miguel Substation to Fanita Junction
CA-SDI-4883	Artifact scatter	Potentially eligible	Miguel Substation to Fanita Junction
CA-SDI-16401	Milling site	Potentially eligible	Miguel Substation to Fanita Junction
Source: Collett and Cl	heever 2002: SDG&F 2003c		

Page D.4-21, under D.4.4.2 Jamacha Valley Overhead A Alternative, "Environmental Impacts and Mitigation Measures" —

Installation of this alternative has the potential to affect known and unknown cultural resources during construction and maintenance operations related to access roads, pole installation, work areas, staging areas, stringing sites, and substations. The construction of access roads for this alternative could potentially impact undiscovered cultural resources, since access roads would not be within the SDG&E right-of way. [. . .]

Page D.4-22, under D.4.4.3 Jamacha Valley Overhead B Alternative, "Environmental Setting" —

This alternative extends from the Herrick Center (Steele Canyon Road and Jamul Drive) to northwest of the intersection of Dehesa Road and Willow Glen Drive in Jamacha Valley. Along most of this alternative route,

the alternative would be confined to the steep slopes and narrow ridges typical of the highlands east of San Diego Bay. It would cross several streams including the Sweetwater River in the Jamacha Valley. Vegetation along the alternative is varied and includes plants typical of the coastal sage scrub and chaparral plant communities, as well as areas of riparian vegetation along floors of the larger drainage channels. Because this alternative is located in SDG&E's existing ROW, ninethe following CRHR-Eligible or Potentially CRHR-Eligible Cultural Resources sites (listed in Tables D.4-84 and D.4-5) for the Proposed Project in the ROW between the Herrick Center and Dehesa Roads would also be potentially affected by this alternative: CA SDI 4883, CA SDI 16401, CA SDI 4650; CA SDI 4652; CA SDI 10648; CA SDI 4881; CA SDI 4515; SDM W 1095; and SDM W 924.

Page D.4-22, added Table D.4-8, "Environmental Setting" —

	ural Resources Identified rhead B Alternative	in the Miguel-Mission Project I	ROW Involving the Jamacha Valley	
Resource	Description	CRHR Eligibility Status	Segment	
CA-SDI-4515	Habitation site	Potentially eligible	Miguel Substation to Fanita Junction	
CA-SDI-4650	Milling site	Potentially eligible	Miguel Substation to Fanita Junction	
CA-SDI-4652	Artifact scatter	Potentially eligible	Miguel Substation to Fanita Junction	
CA-SDI-4881	Habitation site	Potentially eligible	Miguel Substation to Fanita Junction	
CA-SDI-4883	Artifact scatter	Potentially eligible	Miguel Substation to Fanita Junction	
CA-SDI-10648	Milling site	Potentially eligible	Miguel Substation to Fanita Junction	
CA-SDI-16401	Milling site	Potentially eligible	Miguel Substation to Fanita Junction	
SDM-W- 0924	Habitation site	Potentially eligible	Miguel Substation to Fanita Junction	
SDM-W-1095	Habitation site	Potentially eligible	Miguel Substation to Fanita Junction	
Source: Collett and Cheever, 2002; SDG&E, 2003c.				

Page D.4-23, under D.4.4.4 City of Santee 138 kV/69 kV Underground Alternative, "Environmental Setting" —

The location is not particularly favorable for prehistoric habitation sites, although its proximity to the San Diego River, a major stream, would have made it attractive to the Kumeyaay and their predecessors for resource collection and processing. Four archaeological sites are located in the 1.5-milelong stretch of Proposed Project ROW that the existing 138 kV/69 kV circuits traverse (Table D.4-9). Of these four sites, only SDI-4885 is potentially eligible for listing in the CRHR.

Page D.4-23, added Table D.4-9, "Environmental Setting" —

<u>Table D.4-9. Cultural Resources Identified in the Miguel-Mission Project ROW involving the City of Santee</u> 138 kV/69 kV Underground Alternative						
Resource	Description	CRHR Eligibility Status	Segment			
CA-SDI-4885	Artifact scatter	Potentially eligible	Miguel Substation to Fanita Junction			
CA-SDI-12099	Artifact scatter	Not eligible	Miguel Substation to Fanita Junction			
CA-SDI-12244	Milling site	Not eligible	Miguel Substation to Fanita Junction			
CA-SDI-12246	Milling site	<u>Not eligible</u>	Miguel Substation to Fanita Junction			
Source: Collett and Cheever, 2002; SDG&E, 2003c.						

Page D.4-23, under D.4.4.4 City of Santee 138 kV/69 kV Underground Alternative, "Comparison to Proposed Project" —

In general, installing circuits underground increases the amount of ground disturbance and increases the chances of affecting cultural resources. This alternative also requires SDG&E to trench directly through

the center of site SDI-12246, a milling site determined ineligible for listing in the CRHR. Disturbance to this site from construction is not an adverse impact because it is ineligible for listing in the CRHR. Mitigation Measure C-2b would reduce potential impacts to unanticipated discoveries in the site vicinity to less than significant levels. -For this alternative, most of the underground circuit will be along Princess Joann Road, a residential street running through a modern housing development.—Although the depth of disturbance in this area is unknown, modern housing developments usually include extensive grading, particularly in valley floors and drainage channels, and the likelihood of archaeological deposits being present along Princess Joann Road is relatively low. There is a greater likelihood of affecting cultural resources along the paved access road and in the undeveloped portions of this alternative.

Page D.4-24, under D.4.4.5 City of Santee 230 kV Overhead Northern ROW Boundary Alternative, "Environmental Setting" —

The location is not particularly favorable for prehistoric habitation sites, although its proximity to the San Diego River, a major stream, would have made it attractive to the Kumeyaay and their predecessors for resource collection and processing. Because this alternative is located in SDG&E's existing ROW, the <u>four following CRHR Eligible or Potentially CRHR Eligible</u> cultural resources sites that are listed in Table D.4.5 that would potentially be affected by <u>for this part of</u> the Proposed Project <u>(Table D.4-9)</u> would also be potentially affected by this alternative. <u>Of these four sites, only SDI-4885</u> is potentially eligible for listing in the CRHR: <u>CA SDI 12246</u>, <u>CA SDI 12244</u>, <u>CA SDI 12099</u>, and <u>CA SDI 4885</u>.

D.5 Geology, Soils, and Paleontology

Page D.5-12, under D.5.2 Applicable Regulations, Plans, and Standards, "State Statutes" —

The State of California General Order 95, Building Code (CBC, 2001)Rules for Overhead Electric Line Construction (CPUC, 1998) is based on the 1997 Uniform Building Code (UBC), with the addition of more extensive structural seismic provisions. Chapter 16 of the CBC contains definitions of seismic sources and the procedure used to calculate seismic forces on structures. Because the Proposed Project route lies within UBC Seismic Zone 3, provisions for design should follow the requirements of Chapter 16. Chapter 33 of the CBC contains requirements relevant to the construction of underground transmission lines. California Code of Regulations Title 24, Section 3301.2 and 3301.3 et seq. contain the provisions requiring protection of adjacent properties during excavations and requires 10 days written notice and access to the excavation be given to the adjacent property owners. is the governing document for most of the construction of the Proposed Project.

Page D.5-12, under D.5.2 Applicable Regulations, Plans, and Standards, "Local" —

The safety elements of general plans for the cities and the County along the proposed alignment contain policies for the avoidance of geologic hazards and/or the protection of unique geologic features. A survey of general plans along the proposed alignment indicated that most municipalities require submittal of construction and operational safety plans for proposed construction in areas of identified geologic and seismic hazards for review and approval prior to issuance of permits. County and local grading ordinances establish detailed procedures for excavation and grading required for underground construction. No applicable San Diego County regulations or policies have been identified. Because it is a public utility, SDG&E is not required to obtain excavation, grading or building permits from the Applicable City of San Diego regulations are identified below.

City of San Diego Municipal Code

The following regulations apply:

- Excavation fees and permits (Ch 6, Art 2, Div 12, Sec 62.1205)
- Grading regulations (Ch 14, Art 2, Div 1 and 4)
- Building regulations (Ch 14, Art 5, Div 2 Sec 145.0203 and 145.0206)

Page D.5-13, under D.5.3.1 Definition and Use of Significance Criteria —

Geologic and soil conditions, and paleontological resources were evaluated with respect to the impacts the project may have on the local geology, as well as the impact specific geologic hazards and conditions may have upon the Miguel-Mission 230 kV #2 Project. The significance of these impacts was determined on the basis of CEQA statues, guidelines and appendices; thresholds of significance developed by local agencies; government codes and ordinances; and requirements stipulated by California Alquist-Priolo statues. Significance criteria and methods of analysis were also based on standards set or expected by agencies for the evaluation of geologic hazards.

Page D.5-16, under Impact G-1: Seismically Induced Ground Failures Including Liquefaction, Lateral Spreading, and Seismic Slope Instability —

Shallow landslides could be triggered by an exceptional seismic event or even project-related excavation anywhere along the alignment. The most likely areas susceptible to seismic instability occur at Towers

#1290 and above, where tower footings are placed on ridges and slopes on sedimentary rock and are closer to the potentially active La Nacion Fault. Tower footings placed on crystalline bedrock are less susceptible to seismic slope instability.

Page D.5-17, under Impact G-2: Slope Instability Including Landslides, Earth Flows, and Debris Flows May Impact Stability of New Pole Foundations —

As was observed during the site visit, sSmall landslides have occurred in all areas of the Proposed Project where Tertiary-age, flat-lying sediments overlie granitic or metamorphic bedrock. In addition, numerous small landslides and evidence of past earth and debris flows were observed in the poorly consolidated sediments (Poway conglomerate and Friars Formation in the northern portion of the project area, and Otay Formation in the southern portion) during a recent field survey. A landslide, earthflow, or debris flow could destabilize or completely destroy a tower or pole. A landslide initiated by construction of a pole foundation could impact the public. For example, where a pole is placed above a steep slope with a road at the base, such as at the Steele Canyon crossing, a failed pole could impact passing motorists. Placement of towers on mesas, ridges, and spurs should be evaluated by a geologist working with a geotechnical engineer to determine the stability of the site and adjacent slopes. In addition to PP-64 (see Table D.5-5), Mitigation Measure G-2a is recommended to reduce potentially significant impacts associated with slope instability to less than significant levels (Class II).

Page D.5-17, under Mitigation Measure for Impact G-2, Landslides, Earth Flows, and Debris Flows —

G-2a Geotechnical evaluations of ground stability and foundation design. Placement of towers on mesas, ridges, and spurs shall be evaluated by a geologist and geotechnical engineer to determine the stability of the site and adjacent slopes. The study shall consider alternatives for foundation type and depth and provide recommendations for placement of facilities, types of foundations, and remediation of unsuitable ground.

Page D.5-17, under Impact G-3: Increased Soil Erosion Caused by Construction and Use of Maintenance Roads May Impact Tower Stability —

Soils blanketing the hills and mountains in the vicinity of the project area are thin and prone to erosion. Nearly all the soils mapped in the project area are described as "highly erodible" (SCS, 1973). The numerous access roads required to maintain the transmission line tend to funnel surface runoff along the uphill side of the road after rains. During a field visit of the project area in the Spring of 2003, occasional washouts were observed in the San Miguel Mountains where runoff had moved across the road to drain to lower elevations creating small, steep gullies across or through—along the road. The existing access roads focus overland flow and as such contribute to erosion of the soil. To reduce potentially significant erosion impacts associated with construction and use of maintenance access roads to less than significant levels (Class (II), Mitigation Measure G-3a is recommended.

Page D.5-18, Rename Impact G-4 —

Impact G-4: Overuse or Abandonment of Maintenance Roads May Result in Substantial Soil Erosion and Loss of Topsoil

Page D.5-18, under Mitigation Measure for Impact G-4, Erodible Soils —

G-4a Restrict access to maintenance roads. To prevent erosion caused by unauthorized use of the maintenance roads by the general public, access to maintenance roads shall be restricted with devices that effectively bar access by unauthorized vehicles. Abandoned maintenance roads shall be checked periodically (annually) to ensure no additional erosion occurs.

Page D.5-18, under Impact G-5: Construction on Unstable and Erodible Deposits on Ridges and Steep Slopes, and in Areas near Active Washes May Result in Landslides or Undermining of Pole Foundations —

Some of the proposed route is located on mesas or ridges in the northern and western portion of the project area where numerous small landslides have been observed. A landslide could destabilize or damage a tower or pole. PP-11, PP-35, and PP-64 address only some of the issues of unstable soils. PP-64 provides for the removal of boulders upslope of the project alignment and avoiding pole placement in an area of potential landslide. The Applicant's proposed PP-11 and PP-35 discuss construction within streambeds and washes. PP-11 and PP-35 indicate no towers would be placed in streambed crossings; however existing Tower #1380 is currently situated within-immediately adjacent to a cut bank in an active wash in Quail Canyonan active wash. Scouring and erosion associated with periodic flooding could undermine the tower footings if they were not designed to withstand flood erosion. With the implementation of the Project Protocols and the mitigation measures listed below, project impacts should be less than significant.

Page D.5-20, under Mitigation Measure for Impact G-7, Paleontologic Resources —

Paleontological training and monitoring. A qualified paleontologist familiar with the results of the findings of G-7a shall be employed to help implement the paleontological portion of the environmental training program for construction workers. All employees involved with earthmoving during the primary project construction shall receive this training and shall be instructed as to the laws regarding the protection of paleontologic resources. The paleontologist or qualified monitors selected by the paleontologist shall also monitor excavations and drilling for new footings or foundations in sensitive geologic units at the Miguel Substation and along the route west of Eucalyptus Hills (Valle Vista Road). Where fossil finds have been disturbed due to excavation or road grading, the fossils should be collected (salvaged) and prepared for curation with a public museum that has a paleontologic collection. The paleontologist should sample the excavation spoils pile for both mega fossils (can be seen by the naked eye) and microfossils (very tiny fossils that must be retrieved through wet or dry screening of fine-grained samples). The Society of Vertebrate Paleontology guidelines (1995) for monitoring, sampling, and salvaging fossils shall be followed. The results of the paleontologic monitoring shall be presented in a final paleontologic report following completion of the primary project. The reportthat will be held confidential to protect the locations of paleontological resources. A copy of the confidential report and all paleontologic finds from the project shall be donated to a curating museum.

Page D.5-26, in Table D.5-6. Mitigation Monitoring Program – Geology, Soils, and Paleontology —

In each mitigation measure in the table, the "Responsible Agency" item is changed from "CPUC and local planning agencies" to "CPUC"

Responsible Agency	CPUC and local planning agencies.				
In Mitigation Measure G-7b only, the "Timing" item is changed as follows:					
Timing	Prior to construction and throughout the construction phase of the project.				

Page D.5-28, under D.5.7 References —

<u>CPUC. 1998.</u> State of California General Order 95, Rules for Overhead Electric Line Construction.

<u>Reviewed online at http://www.cpuc.ca.gov/static/official+docs/i_go.htm</u>

D.6 Hydrology and Water Quality

Page D.6-13, under Impact H-6: Construction in a Potential Dam Inundation Area —

The Proposed Project would cross the Sweetwater River downstream of the Loveland Reservoir, as well as the San Diego River downstream of the Lake Jennings, El Capitan and San Vicente Reservoirs. The unlikely event of a dam failure would result in a dam-inundation floodplain crossing the project path and possibly inundating a portion of the Los Coches substation. The Proposed Project power lines would span the dam inundation area with overhead cables. Tower foundations within the dam inundation area could be affected by flowing water, which would cause scour issues around the base of the towers and poles. The likely worst-case consequences would be a destabilization of the power poles and flood damage to the Los Coches substation, which may result in temporary interruption of the power supply. Since the risk of dam inundation is considered low, and adverse environmental consequences low, this impact would be considered adverse but less than significant and no mitigation is required (Class III).

Page D.6-13, under D.6.4.1 Jamacha Valley 138 kV/69 kV Underground Alternative, "Environmental Impacts and Mitigation Measures" —

Impact H-3, Groundwater Disturbance and Water Quality Degradation Through Project-Related Excavation, applies in the same manner as for the Proposed Project, but the Jamacha Valley 138 kV/69 kV Underground Alternative would require approximately 3.5 miles of trenching through an area overlying a portion of the Sweetwater Valley Groundwater Basin. This linear trenching activity has the potential to ereate a conduit fordisturb or contaminate shallow groundwater, which may result in groundwater impacts. Mitigation Measure H-3a is recommended to ensure groundwater impacts for this alternative are less than significant (Class II).

<u>Mitigation Measure for Impact H-3, Groundwater Disturbance and Water Quality</u> <u>Degradation Through Project-Related Excavation</u>

H-3a Groundwater evaluation prior to construction. A groundwater evaluation shall be conducted before construction to determine areas where, based on well logs and other available groundwater information, proposed trenching is likely to encroach into the groundwater table. SDG&E shall document results of the groundwater evaluation in a letter report to the CPUC at least 30 days before construction starts and shall propose specific means to minimize the impact on groundwater if shallow groundwater is expected to be found within the trench area. These measures must be approved by the CPUC prior to the start of construction of the underground segment.

However, the risk of groundwater contamination is expected to be low because the excavation would be shallow and beneath an existing roadway, which is located above the 100 year flood level. Further, PP 16, PP 38, and PP 39 would ensure proper disposal of hazardous materials and proper construction techniques in groundwater areas. With the implementation of the Project Protocols, and considering the shallow depth of excavation, Impact H 6 is classified as adverse but less than significant with no mitigation required (Class III) for this alternative.

<u>As described above, this alternative would cross a tributary to the Sweetwater River.</u> Impact H-7 is added for this alternative.

Page D.6-14, under Impact H-7: Exposure of the Underground Cable to Damage through Stream Scour and Erosion —

As described above, this alternative would cross a tributary to the Sweetwater River. Segments of the underground cable placed below natural-bed streams, or adjacent to natural-bank streams could be exposed through scour or bank erosion. Exposure of the duct bank and cable could lead to power outages or shock hazard. However, these adverse impacts from stream scour issues are unlikely to occur with this alternative because the cable would be placed in a concrete duct bank and protected by a roadway embankment. Mitigation Measure H-7a is recommended to ensure stream scour related impacts are less than significant (Class II). As a result, Impact H 7 is considered adverse but less than significant (Class III), and no mitigation is required.

<u>Mitigation Measure for Impact H-7, Exposure of the Underground Cable to Damage through</u> <u>Stream Scour and Erosion</u>

H-7a Underground cable shall be protected against scour and erosion. At locations where the underground cable would cross below or pass adjacent to streams with erodible beds or banks, the burial depth shall be extended below the estimated 100-year depth of scour for that stream, or located at a sufficient distance from the bank as to avoid erosion that can reasonably be expected to occur during the life of the project. Plans depicting proposed burial depths, with supporting calculations, shall be submitted to the CPUC for review and approval at least 60 days before construction.

Page D.6-14, under D.6.4.1 Jamacha Valley 138 kV/69 kV Underground Alternative, "Comparison to Proposed Project" —

This alternative would cross the same number of watercourses as the Proposed Project, in a very similar setting. The main difference between the Proposed Project and this alternative is that this alternative would run parallel to the Sweetwater River and would cross a tributary to the river in an underground cable rather than by overhead span. As a result, the potential for groundwater impacts, while less than significant with mitigation, would be greater for this alternative. As a result of these potential groundwater impacts and greater length of trenching, cConstruction-related water quality impacts would be greater than for the proposed project. reduced due to the avoidance of new power poles proposed along this segment of the ROW under the Proposed Project, and resulting avoidance of the need to construct access roads in those areas. This route has an additional impact (H-7), that is, not applicable to the Proposed Project. Impact H-7, Exposure of the Underground Cable to Damage through Stream Scour and Erosion, but it is considered less than significant with mitigation (Class IH).

Page D.6-16, under D.6.4.4 City of Santee 138 kV/69 kV Underground Alternative, "Environmental Impacts and Mitigation Measures" —

Impacts H-3 through H-7 would apply to the City of Santee 138 kV/69 kV Underground Alternative portion of this alternative in the same manner as described for the Jamacha Valley 138 kV/69 kV Underground Alternative, with the exception that the City of Santee 138 kV/69 kV Underground Alternative lies above the San Diego Groundwater Formation, not the Sweetwater Valley Groundwater Basin. However, it is unlikely that groundwater would be encountered during trenching because of the shallow depth of excavation. The Project Protocols would ensure proper construction techniques during shallow trenching activities. As a result, Impact H-3, related to potential groundwater contamination and disturbance, is considered adverse but less than significant (Class III). Impact H-7, related to stream scour, is considered potentially significant because a natural stream will be crossed by an underground cable. Although the watershed is small and the extent of stream scour and erosion likely low, Mitigation

Measure H-7a, <u>underground cable shall be protected against scour and erosion</u>, is recommended to ensure impacts are mitigated to less than significant levels (Class II).

Mitigation Measure for Impact H-7, Exposure of the Underground Cable to Damage through Stream Scour and Erosion

H-7a Underground cable shall be protected against scour and erosion. At locations where the underground cable would cross below or pass adjacent to streams with erodible beds or banks, the burial depth shall be extended below the estimated 100 year depth of scour for that stream, or located at a sufficient distance from the bank as to avoid erosion that can reasonably be expected to occur during the life of the project. Proposed burial depths shall be submitted to the CPUC for review and approval at least 60 days before construction.

D.7 Land Use and Recreation

Page D.7-6, under D.7.2 Applicable Regulations, Plans, and Standards, "Local" —

• City of Santee 2020 General Plan (proposed in 2003)

Page D.7-11, under Impact L-5: Disrupt Recreational Activities —

Temporary Impacts Resulting from Construction Activities. Transmission tower removal and replacement and substation construction—would largely occur within the boundary of the existing ROW and outside the boundaries of recreational areas. Due to the expected location of construction outside the majority of recreation areas, work on the transmission towers and substations—is not anticipated to substantially restrict access or preclude the use of recreational facilities. Project construction activities, could, however, restrict the use of access roads or otherwise temporarily block access to recreational resources near the ROW, particularly Cottonwood at Rancho San Diego Golf Club. The Proposed Project passes directly over Cottonwood just before the intersection of the ROW and Willow Glen Drive. These impacts would be considered potentially significant (Class II), but could be reduced to less than significant levels with the implementation of Mitigation Measures L-5a and L-5b (below). While SDG&E includes as part of the Proposed Project various Project Protocols intended to reduce impacts of the Proposed Project, these protocols do not fully mitigate recreational resource disruptions to less than significant levels. Mitigation Measures L-5a and L-5b (below) address potentially significant impacts the Protocols do not address, and would reduce construction disruption impacts to less than significant.

Page D.7-12, under Mitigation Measures for Impact L-5, Disrupt Recreational Activities —

- **L-5a Avoid peak recreational usage.** SDG&E shall not schedule construction during times of peak usage (i.e., weekends and holidaysas defined by and coordinated with recreational facility operators) at the following recreational areas:
 - All Class II Bikeways
 - Cottonwood at Rancho San Diego Golf Club
 - Lake Jennings County Park
 - San Diego River
 - Louis A. Stelzer County Park
 - Santee Lakes Regional Park and Campground
 - Mission Trails Regional Park
 - Admiral Baker Golf Course
 - Any other recreational resource the CPUC determines to be impacted by construction. If
 the CPUC determines another recreational resource is being impacted during peak recreational hours, SDG&E shall reschedule the appropriate construction activities such that they
 occur outside times of peak usage (i.e., weekends and holidays as defined by and
 coordinated with recreational facility operators).

Page D.7-14, under D.7.4.1 Jamacha Valley 138 kV/69 kV Underground Alternative, "Environmental Impacts and Mitigation Measures" —

Construction impacts resulting from undergrounding the 138 kV/69 kV circuits in Jamacha Valley would be potentially greater than the Proposed Project due to a longer construction schedule and

increased potential disruptions of access associated with the undergrounding process. For example, according to SDG&E, the entrance to Cottonwood Golf Course could be closed for up to eight weeks during construction activities. In addition, 1,000 feet of trenching would be required in the northern end of this alternative, and the installation of two additional steel poles would be required. Impacts L-2 (Physically Divide an Established Community), L-3 (Disrupt an Established Land Use), L-4 (Substantially Deteriorate a Recreational Facility), L-6 (Convert Farmland to Non-Agricultural Use), and L-7 (Conflict with an Existing Agricultural Use or a Williamson Act Contract) would be adverse, but less than significant (Class III), while Impacts L-1 (Conflict with an Applicable Land Use Plan, Policy, or Regulation) and L-5 (Disrupt Recreational Activities) would be potentially significant. Implementation of Mitigation Measures L-5a (Avoid peak recreational usage) and L-5b (Notify users of recreational resources) would reduce these impacts to less than significant levels (Class II).

D.8 Noise and Vibration

Page D.8-8, under Mitigation Measure for Impact N-1, Construction Activity Would Temporarily Increase Local Noise Levels, changes to Mitigation Measure N-1a —

N-1a Provide advance notice of construction. SDG&E or its construction contractor shall provide advance notice, between two and four weeks prior to construction, by mail to all sensitive receptors and residences within 300 feet of construction sites, staging areas, and access roads. The announcement shall state specifically where and when construction will occur in the area. If construction delays of more than 7 days occur, an additional notice shall be made, either in person or by mail. Notices shall provide tips on reducing noise intrusion, for example, by closing windows facing the planned construction. The notice shall also advise the recipient on how to inform the Applicant/contractor if specific noise or vibration sensitive activities are scheduled so that construction can be rescheduled, if necessary, to avoid a conflict. SDG&E shall also publish a notice of impending construction in local newspapers, stating when and where construction will occur.

Page D.8-9, under Impact N-3: Operation of the Transmission Line Would Cause Corona Noise —

The potential for noise from corona discharge is greatest with high voltage lines during wet weather or near inconsistencies or cuts in the metal surface of the line itself. For example, the highest noise level generated by the 230 kV line during fair weather conditions would be around 15 dBA. This would be below the ambient noise levels in even the most pristine natural setting. During rain or fog, the highest noise level at the edge of the ROW of the Proposed Project would be 40.7 dBA L₅₀ (PEA, 2002). This could occur for Segment F6, west of the Elliott Substation and north of the ROW, where there are residences along the north edge of the ROW.

Page D.8-10, under Mitigation Measure for Impact N-3, Operation of the Transmission Line Would Cause Corona Noise, changes to Mitigation Measure N-3a —

N-3a Achieve compliance with City of San Diego noise abatement code. SDG&E shall prepare a submit predicted noise assessment report levels for review by the City of San Diego Neighborhood Code Compliance Department and the CPUC. The report shall identify the transmission line location(s) in the City of San Diego where it would be adjacent to residences and for those locations, the configuration of the transmission line sections, the expected maximum corona noise levels at the edge of the ROW (in terms of L₅₀ and L_{eq}), and the locally applicable noise limits. SDG&E shall identify its plans to reduce corona noise and in the report whether any additional design features or changes in line configuration are available to reduce corona noise. The report information shall be submitted to the City and the CPUC at least 90 days prior to commencing construction, and it shall include a request for a determination by the City of whether the project would be likely to comply with the local municipal code. Prior to commencing construction operation, SDG&E shall provide to the CPUC evidence of a successful determination of compliance from the local agency.

Page D.8-10, under Impact N-4: Inspection and Maintenance Activities Would Cause Occasional Noise —

Routine inspection and maintenance of the transmission lines would be accomplished with either ground access or helicopter fly-over. Visits to the substations as a result of the Proposed Project would nor-

mally require one crew in a light utility truck weekly and approximately six visits per year by larger crews. Because the visits would be infrequent, no significant noise increase would be associated with this activity (Class III).

Page D.8-11, under D.8.3.4 Future 230 kV Circuit within Miguel-Mission ROW —

Operation of the future circuit would likely result in increased corona noise for all receptors along the alignment. Impact N-3 would likely be more severe than it would be with the Proposed Project, and along with the potentially significant project-related impact within the City of San Diego, additional impacts could occur to other communities. As with the Proposed Project, implementation of PP-8 and PP-9 and Mitigation Measures N-3a and N-3b would be necessary to minimize the impact. There is also a possibility that increased corona noise associated with an additional circuit could adversely affect receptors outside of the City in unincorporated San Diego County. Although it would be speculative to characterize the impact to San Diego County, if a significant impact would occur, Mitigation Measures N-3a and N-3b would be recommended (with minor revisions) to reduce this impact to less than significant levels (Class II). Impact N-4 would remain similar to inspection and maintenance impacts under the Proposed Project (Class III), but Impact N-5 could increase and possibly become significant and warrant additional unforeseeable mitigation if because of additional transformers would be needed circuit breakers at the terminal substations (i.e., Sycamore Canyon Substation). Although it would be speculative to characterize the impact from additional transformer noise, mitigation measures would likely be available to reduce this impact to Similar to the Proposed Project, substation noise would likely be at less than significant levels (Class III).

D.9 Public Health and Safety

Page D.9-7, under Mitigation Measure for Impact HZ-1, Previously Unknown Soil or Groundwater Contamination Could Be Encountered During Construction —

HZ-1a Observation of soil for contamination. During trenching, grading, or excavation work for the Proposed Project, the contractor shall observe the exposed soil for visual evidence of contamination. If visual contamination indicators are observed during construction, the contractor shall stop work at the location of the discovery until the material is properly characterized and appropriate measures are taken to protect human health and the environment. The contractor shall comply with all local, State, and federal requirements for sampling and testing, and subsequent removal, transport, and disposal of hazardous materials. In the event contaminated groundwater is encountered, the contractor shall comply with all applicable regulations and permit requirements. This may include laboratory testing, treatment of contaminated groundwater, or other disposal options.

Page D.9-8, under Mitigation Measures for Impact HZ-3, Release of Hazardous Materials Could Occur During Substation Operations —

HZ-3b Documentation of compliance. SDG&E shall implement PP-7 and PP-33 at the substations, and shall document compliance by (a) submitting to the CPUC an outline of the proposed Environmental Training Program for review and approval, and (b) providing a list of names of all operations personnel who have completed the training program.

Page D.9-15, under D.9.6.1 EMF in the Proposed Project Area —

Public exposure to EMFs in developed areas is widespread and encompasses a very broad range of field intensities and durations. In developed areas, EMFs are prevalent from the use of electronic appliances or equipment and existing electric power lines. In general, distribution lines exist throughout developed portions of the community and represent the predominant source of public exposure to power line EMF. Transmission lines are much less prevalent in most developed areas and therefore they generally represent a much lower contribution to overall public exposure to power line EMF. In undeveloped and natural areas, only low level—naturally occurring EMFs exist. Measurable power frequency EMFs are not present except in the vicinity of existing power line corridors.

Page D.9-16, in Table D.9-4, changes to Subsections B2, C, and F1-F7. Displaying only the affected rows —

Table D.9-4. Distances to Existing Transmission Lines at Left and Right Sides of Right-of-Way by Subsection and Transmission Line Voltage

Subsection	ROW Width (ft)	TL voltage (kV)	Distance from Left* (ft)	Distance from Right* (ft)	Notes
B2	200	69	10	12	One circuit on pole (at 10 ft.), one circuit on tower (at 50 ft.) Section B3 contains underbuilt distribution circuits 246, 247
С	250	69	10	10	One circuit on pole (at 10 ft.), one circuit on tower (at 50 ft.)
F1-F7	200	138	— <u>55</u>	50	
		230	55	<u>—50</u>	One circuit on 9 towers from Fanita Junction, then on 37 steel poles to Mission Substation.

Page D.9-18, under D.9.6.2 Other Field-Related Public Concerns, "Wind, Earthquake, and Fire Hazards" —

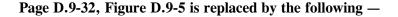
Transmission line structures used to support overhead transmission lines must meet the requirements of the California Public Utilities Commission, General Order No. 95, Rules for Overhead Electric Line Construction. This design code and other applicable requirements the National Electrical Safety Code include loading requirements related to wind conditions. Transmission support structures are designed to withstand different combinations of loading conditions including extreme winds. These design requirements include use of safety factors that consider the type of loading as well as the type of material used, e.g., wood, steel or concrete. Failures of transmission line support structures are extremely rare and are typically the result of anomalous loading conditions such as tornadoes or ice-storms.

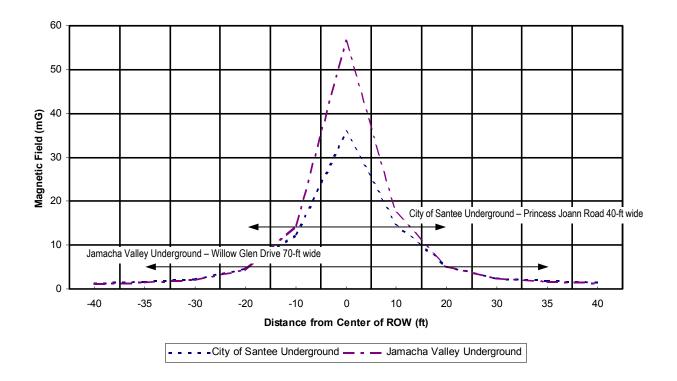
Page D.9-21, under D.9.6.3 Scientific Background and Regulations Applicable to EMF, "Scientific Panel Reviews" —

Scientific panel reviews and reports include those prepared by California (California Department of Health Services [CDHS, 2002]) and several states. The most recent and complete federal government report was prepared by the U.S. National Institute of Environmental Health Sciences (NIEHS, 1998; 1999). The World Health Organization (WHO) (2001) and its affiliated International Agency for Research on Cancer (IARC, 2002) also have sponsored in-depth reviews. Ministries and agencies of many countries also have contributed reports based on scientific expertise. Standards-setting organizations such as the International Commission on Non-Ionizing Radiation Committee Protection (ICNIRP, 1998), Institute of Electrical and Electronic Engineers (IEEE) International Committee on Electromagnetic Safety (ICES) (IEEE, 2002), and American Conference of Governmental and Industrial Hygienists also have evaluated the literature in order to specify protective levels for workers and the general public. Because each panel reflects the influences of new research, conclusions from various reports have evolved over time. Summaries of key recent reports are presented below, starting with the most recent.

Page D.9-31, under D.9.6.4 Consideration of Electric and Magnetic Fields (EMFs), "EMF Issues Applicable to Alternatives" —

Five alternatives have been identified. Two of these involve placing 138 kV and 69 kV transmission lines underground, and three would alter the proposed configurations of the 138 kV and 69 kV transmission lines and the new 230 kV transmission line within the existing ROW. Relocation of the 138 kV and 69 kV circuits underground would reduce field levels along the ROW and introduce magnetic fields to the route of the underground lines. When compared to field levels from overhead lines, those from underground lines decay much more rapidly with lateral distance, but they can be quite high at locations over the centerline of the cable route. This is because underground conductors would be much closer to ground level than those overhead. For each of the underground alternatives, it was assumed that duct bank for the 138 kV and 69 kV circuits would be covered by at least 36 inches of backfill (Commonwealth, 2004) and that the duct bank is in the center of the road ROW. Until detailed engineering and design of underground alternatives reveals otherwise, placement in the center of the ROW is assumed to be feasible for minimizing the field levels at the edge of the ROW. Compared to the Proposed Project, the alternatives would affect magnetic field levels as follows: [. . .]





Page D.9-34, under D.9.7.1 Definition and Use of Significance Criteria, "Wind, Earthquake, and Fire Hazards" -

Transmission line structures used to support overhead transmission lines must meet the requirements of the California Public Utilities Commission, General Order No. 95, Rules for Overhead Electric Line Construction. This design code and the National Electrical Safety Code other applicable requirements include loading requirements related to wind conditions.

Page D.9-34, under Mitigation Measures for Impact PS-1, Radio and Television Interference —

PS-1a Limit conductor surface potential. SDG&E shall_, prior to construction, specify and implement designs that limit the conductor surface electric gradient in accordance with the IEEE Radio Noise Design Guide.

D.10 Public Services and Utilities

Page D.10-1, under D.10.1 Environmental Setting for the Proposed Project —

This public service and utility systems analysis examines the utility and service provisions along the Proposed Project route. Because government agencies have recently categorized data pertaining to utility systems (including their location, capacity, and type) as sensitive, critical infrastructure information, public access to these data has become restricted for security reasons. As such, only information that continues to be made public and is readily accessible is presented in this section. While specific data would provide a better picture of the existing utilities along the pipeline_transmission_line corridors, in large part, this level of detail is unnecessary for the level of analysis needed to determine the impacts generated by the Proposed Project.

Page D.10-3, under D.10.2 Applicable Regulations, Plans, and Standards, "State" —

The responsibilities of utility operators are detailed in Sections 1091-1102, Chapter 5 "Certificates of Public Convenience and Necessity", Article 5 of the California Public Utilities Code. For the construction of utility lines that cost in excess of \$50 megawatts million dollars in which there is a significant potential for problems to occur, this law requires utilities to appoint a construction project board of consultants to evaluate the design, construction, project management, and economic soundness of the proposed line. The potential for problems to arise from the project is determined from information submitted in the project's application to the Public Utilities Commission, subject to Sections 1003 and 1003.5, Chapter 5, Article 1 of the California Public Utilities Code.

Page D.10-5, under Impact U-1: Utility System Disruptions —

During construction of the Proposed Project, installation of the new poles would require drilling and excavation for new foundations. It is possible that buried utility lines (e.g., water, sewer, electricity, natural gas, telecommunications, etc.) share the proposed ROW with existing transmission lines or run perpendicular to the proposed ROW. Therefore, there could be a potential for utility service interruptions during drilling and excavation activities associated with the Proposed Project. Pole replacement activities would be limited to the portion of the ROW between Miguel Substation and Fanita Junction only. Excavation and drilling along the proposed overhead segment would be in specific locations along the existing 138 kV and 69 kV circuit line ROW where there would be a need for tower replacements. New tower drilling and excavation activities could potentially impact buried utility crossings along this segments of the proposed route , particularlythat are near residential areas or public ROWs in urbanized Since construction along this segment would not require continuous trenching, potential for accidental disruption of utilities is relatively low. However, as described above in PP-66, the Applicant is required by State law to contact Underground Service Alert and manually probe for existing buried utilities in the Proposed Project corridor prior to any powered-equipment drilling or excavation. After probing within the corridor for existing utilities, exact placement of the tower and pole foundations would be determined so that they would not conflict with other co-located utilities. This Project Protocol would reduce these potential impacts to an adverse but less than significant level (Class III).

Page D.10-6, under Mitigation Measure for Impact U-2, Public Service System Disruptions, changes to Mitigation Measure U-2a —

U-2a Maintain adequate emergency vehicle access. As appropriate, SDG&E shall implement measures from the Work Area Protection and Traffic Control Manual to maintain adequate emergency vehicle access when crossing existing roadways.—SDG&E shall coordinate with

appropriate permitting agencies for review and approval of Proposed Project traffic control plans and any required protocols to maintain adequate emergency vehicle access when crossing existing roadways. These protocols (usually from the Work Area Protection and Traffic Control Manual) would help ensure use of highly visible warning signs, flaggers, barricades, flashers, or traffic cones to give advance warning, and use of channelization devices to define traffic lanes through the work zone and separate opposing lanes of traffic. Flaggers shall wear approved warning garments and follow standard flagging procedures. SDG&E shall provide to the CPUC evidence of its Traffic Control Plan for the Proposed Project and any associated permits with regard to emergency vehicle access upon approval and receipt from appropriate permitting agencies.

Page D.10-7, under Impact U-3: Project-Required Utility and Public Service Demands —

Proposed Project construction would generate waste largely in the form of soil, concrete from existing foundations, and scrap metal from the existing tower replacements. As described in Section B, Project Description, approximately 31 existing wood and metal transmission towers are to be removed under the Proposed Project and replaced with new towers. Metal from the tower structures would be transported by truck or helicopter to staging areas for dismantling, or may be dismantled on site, as appropriate and then hauled to staging areas. The remaining metal debris would be hauled to a recycling plant. New tower footings and foundations would require excavation of holes 3 feet in diameter and 8 to 12 feet in depth (wood poles) to approximately 8 to 9 feet in diameter and 20 to 40 feet in depth (steel poles). Debris would be removed before the hole would be backfilled with soil and revegetated. This material, along with packing crates, spare bolts, and other construction debris would be hauled offsite for recycling or disposal at local landfills. Soil from drilling or excavation for new tower foundations would be screened as necessary to meet structural requirements, and would then be separated for use as backfill materials at the site of origin to the maximum extent possible. Spoils unsuitable for backfill use would be disposed of at appropriate disposal sites. As identified in Tables D.10-1 and D.10-2, the project route is served by a variety of waste management agencies and landfills. Due to the number and capacity of landfills serving the project area, capacity for materials generated from construction of the Proposed Project is expected to be available. Recycling activities would reduce the quantity of construction-related materials transported to local landfills. Construction activities would not substantially affect the remaining capacities of local landfills. Project operations would not generate solid waste and would therefore not affect existing landfill capacities. Impacts to solid waste facilities would be adverse, but less than significant (Class III).

Page D.10-8, under D.10.4.1 Jamacha Valley 138 kV/69 kV Underground Alternative, "Environmental Impacts and Mitigation Measures" —

The impacts of this alternative would be greater than those of the Proposed Project due to trenching required for the underground portion of the alternative along the length of Willow Glen Drive to the intersection of Willow Glen Drive and Dehesa Road. Emergency access could potentially be blocked due to trenching. The proposed PP-66 and Mitigation Measure U-1a (below) would reduce service disruption impacts to buried utility lines (Impact U-1) to adverse but less than significant levels (Class III). Similar to the Proposed Project, this alternative route could result in impacts to emergency service vehicle access during transmission line stringing across public roadwaysproject implementation (Impact U-2). Mitigation Measure U-2a associated with the Proposed Project would also be required to mitigate possible emergency access impacts during construction of this alternative to less than significant levels (Class II).

Construction of the alternative would require water for dust suppression and would generate small amounts of construction waste and construction debris. Minimal wastewater is expected to be generated during construction. Operations of the proposed substationsproject would require no water and would generate no solid waste or wastewater and would have no impact on water supply, wastewater, and solid waste facilities. Impacts on utility and service provider demands (Impact U-3) associated with water supply, wastewater facilities, area landfills, and police and fire service would be adverse but less than significant (Class III).

Because underground line construction involves more construction in close proximity to existing utilities on a mile-per-mile basis than overhead construction, the chances of underground line construction activities causing an accidental utility service interruption are greater than for overhead construction. In addition, there is potential for the proposed underground transmission line to increase corrosion on existing steel pipelines which could lead to long term accidental system disruption of such pipelines. Accidental service disruptions would be considered potentially significant impacts, but mitigable to less than significant levels (Class II) with implementation of Mitigation Measures U-1a below.

Mitigation Measure for Impact U-1: Utility System Disruption

U-1a Protect Utilities Against Corrosion. SDG&E shall evaluate the potential for the underground transmission line to increase corrosion on existing pipelines. If this potential is determined to exist, SDG&E shall be responsible for installation of the required cathodic protection systems that would eliminate this risk. A letter documenting these consultations and their results, including concurrence by the affected jurisdiction(s) and other companies, shall be provided to the CPUC prior to the start of construction.

Page D.10-8, under D.10.4 Jamacha Valley 138 kV/69 kV Underground Alternative, "Comparison to Proposed Project" —

Impacts associated with the Jamacha Valley 138 kV/69 kV Underground Alternative would be greater than those of the Proposed Project, but all impacts remain less than significant. Excavation for the underground trench portion of the route would have a greater potential to disrupt underground utilities such as water, electricity, natural gas, and telecommunications than excavation required for tower foundations. In addition, underground trenching activities could potentially restrict emergency vehicle service access. However, as discussed above, utility service interruptions could occur during the construction of both the Proposed Project and the Jamacha Valley 138 kV/69 kV Underground Alternative. Both would require implementation of PP-66 and notification to the public should utility services be disrupted in the surrounding area to mitigate these impacts.

Page D.10-10, under D.10.4.3 Jamacha Valley Overhead B Alternative, "Environmental Impacts and Mitigation Measures" -

Construction of the alternative would require <u>more</u> water for dust suppression than for the Proposed Project., and would generate Also, small amounts of construction waste and construction debris would be generated. Minimal wastewater is expected to be generated during construction. Operations of the proposed substations would require no water and would generate no solid waste or wastewater and would have no impact on water supply, wastewater, and solid waste facilities. Impacts on utility and service provider demands (Impact U-3) associated with water supply, wastewater facilities, area landfills, and police and fire service would be adverse but less than significant (Class III).

Page D.10-10, under D.10.4.3 Jamacha Valley Overhead B Alternative, "Comparison to Proposed Project" —

Installation of the Jamacha Valley Overhead B Alternative would cause a slightly greater likelihood of disrupting utilities during construction when compared to the Proposed Project <u>due to the need for installation of additional poles</u>. Similar to the Proposed Project, this alternative would require notification to the public should utility services be disrupted in the surrounding area. Mitigation associated with the Proposed Project would also be required to mitigate possible emergency access impacts during construction of this alternative.

Page D.10-11, under D.10.4.4 City of Santee 138 kV/69 kV Underground Alternative, "Environmental Impacts and Mitigation Measures" —

The impacts of this alternative would be greater than those of the Proposed Project due to trenching required in the City of Santee streets. Like the Jamacha Valley 138 kV/69 kV Underground Alternative, there is potential for the proposed underground transmission line to increase corrosion on existing steel pipelines in the roadways, which could lead to long term accidental system disruption of such pipelines (Class II). However, tThe proposed PP-66 and Mitigation Measure U-1a would reduce service disruption impacts to buried utility lines (Impact U-1) to adverse but less than significant levels (Class III). Similar to the Proposed Project, the alternative route could result in impacts to emergency service vehicle access during transmission line stringing across public roadways (Impact U-2). Mitigation Measure U-2a associated with the Proposed Project would also be required to mitigate possible emergency access impacts during construction of this alternative to less than significant levels (Class II).

Page D.10-11, under D.10.4.4 City of Santee 138 kV/69 kV Underground Alternative, "Comparison to Proposed Project" —

Impacts associated with the City of Santee 138 kV/69 kV Underground Alternative would be slightly greater than the Proposed Project. Excavation for the undergrounding portion of the route would have a greater potential to disrupt utilities such as water, electricity, natural gas, and telecommunications than excavation required for tower foundations. In addition, underground trenching activities could potentially restrict emergency vehicle service access. However, as discussed above, utility service interruptions could occur during construction of both the Proposed Project and alternatives. Both would require notification to the public should utility services be disrupted in the surrounding area to mitigate these impacts.

Page D.10-12, under D.10.4.5 City of Santee 230 kV Overhead Northern ROW Boundary Alternative, "Comparison to Proposed Project" —

Installation of the City of Santee 230 kV Overhead Northern ROW Boundary Alternative would result in temporary construction impacts similar to those of the Proposed Project, except that construction along the northern edge of the ROW would be slightly less likely to disrupt utilities, especially east of Magnolia Avenue because one less pole would need to be constructed. Similar to the Proposed Project, this alternative would require notification to the public should utility services be disrupted in the surrounding area. Mitigation associated with the Proposed Project would also be required to mitigate possible emergency access impacts during construction of this alternative.

Page D.10-13, in Table D.10-4. Mitigation Monitoring Program – Public Services and Utilities. Mitigation Measure U-1a added; Mitigation Measure U-1b edited —

IMPACT U-1	Utility System Disruption (Class II)
MITIGATION MEASURE	<u>U-1a: Protect Utilities Against Corrosion.</u> SDG&E shall evaluate the potential for the underground transmission line to increase corrosion on existing pipelines. If this potential is determined to exist, SDG&E shall be responsible for installation of the required cathodic protection systems that would eliminate this risk. A letter documenting these consultations and their results, including concurrence by the affected jurisdiction(s) and other companies, shall be provided to the CPUC prior to the start of construction.
Location	In streets with underground transmission line construction under the Jamacha Valley 138 kV/69 kV Underground Alternative and the City of Santee 138 kV/69 kV Underground Alternative
Monitoring / Reporting Action	Written documentation to affected jurisdictions and CPUC
Effectiveness Criteria	Transmission line does not cause corrosion in nearby existing pipelines.
Responsible Agency	<u>CPUC</u>
Timing	Prior to construction
-	
IMPACT U-2	Public Service System Disruptions (Class II)
IMPACT U-2 MITIGATION MEASURE	U-2a: Maintain adequate emergency vehicle access. As appropriate, SDG&E shall implement measures from the Work Area Protection and Traffic Control Manual to maintain adequate emergency vehicle access when crossing existing roadways. SDG&E shall coordinate with appropriate permitting agencies for review and approval of Proposed Project traffic control plans and any required protocols to maintain adequate emergency vehicle access when crossing existing roadways. These protocols (usually from the Work Area Protection and Traffic Control Manual) would help ensure use of highly visible warning signs, flaggers, barricades, flashers, or traffic cones to give advance warning, and use of channelization devices to define traffic lanes through the work zone and separate opposing lanes of traffic. Flaggers shall wear approved warning garments and follow standard flagging procedures. SDG&E shall provide to the CPUC evidence of its Traffic Control Plan for the Proposed Project and any associated permits with regard to emergency vehicle access upon approval and receipt from appropriate permitting agencies.
	U-2a: Maintain adequate emergency vehicle access. As appropriate, SDG&E shall implement measures from the Work Area Protection and Traffic Control Manual to maintain adequate emergency vehicle access when crossing existing roadways. SDG&E shall coordinate with appropriate permitting agencies for review and approval of Proposed Project traffic control plans and any required protocols to maintain adequate emergency vehicle access when crossing existing roadways. These protocols (usually from the Work Area Protection and Traffic Control Manual) would help ensure use of highly visible warning signs, flaggers, barricades, flashers, or traffic cones to give advance warning, and use of channelization devices to define traffic lanes through the work zone and separate opposing lanes of traffic. Flaggers shall wear approved warning garments and follow standard flagging procedures. SDG&E shall provide to the CPUC evidence of its Traffic Control Plan for the Proposed Project and any associated permits with regard to emergency
MITIGATION MEASURE	U-2a: Maintain adequate emergency vehicle access. As appropriate, SDG&E shall implement measures from the Work Area Protection and Traffic Control Manual to maintain adequate emergency vehicle access when crossing existing roadways. SDG&E shall coordinate with appropriate permitting agencies for review and approval of Proposed Project traffic control plans and any required protocols to maintain adequate emergency vehicle access when crossing existing roadways. These protocols (usually from the Work Area Protection and Traffic Control Manual) would help ensure use of highly visible warning signs, flaggers, barricades, flashers, or traffic cones to give advance warning, and use of channelization devices to define traffic lanes through the work zone and separate opposing lanes of traffic. Flaggers shall wear approved warning garments and follow standard flagging procedures. SDG&E shall provide to the CPUC evidence of its Traffic Control Plan for the Proposed Project and any associated permits with regard to emergency vehicle access upon approval and receipt from appropriate permitting agencies.
MITIGATION MEASURE	U-2a: Maintain adequate emergency vehicle access. As appropriate, SDG&E shall implement measures from the Work Area Protection and Traffic Control Manual to maintain adequate emergency vehicle access when crossing existing roadways. SDG&E shall coordinate with appropriate permitting agencies for review and approval of Proposed Project traffic control plans and any required protocols to maintain adequate emergency vehicle access when crossing existing roadways. These protocols (usually from the Work Area Protection and Traffic Control Manual) would help ensure use of highly visible warning signs, flaggers, barricades, flashers, or traffic cones to give advance warning, and use of channelization devices to define traffic lanes through the work zone and separate opposing lanes of traffic. Flaggers shall wear approved warning garments and follow standard flagging procedures. SDG&E shall provide to the CPUC evidence of its Traffic Control Plan for the Proposed Project and any associated permits with regard to emergency vehicle access upon approval and receipt from appropriate permitting agencies. Streets crossing the ROW
MITIGATION MEASURE Location Monitoring / Reporting Action	U-2a: Maintain adequate emergency vehicle access. As appropriate, SDG&E shall implement measures from the Work Area Protection and Traffic Control Manual to maintain adequate emergency vehicle access when crossing existing roadways. SDG&E shall coordinate with appropriate permitting agencies for review and approval of Proposed Project traffic control plans and any required protocols to maintain adequate emergency vehicle access when crossing existing roadways. These protocols (usually from the Work Area Protection and Traffic Control Manual) would help ensure use of highly visible warning signs, flaggers, barricades, flashers, or traffic cones to give advance warning, and use of channelization devices to define traffic lanes through the work zone and separate opposing lanes of traffic. Flaggers shall wear approved warning garments and follow standard flagging procedures. SDG&E shall provide to the CPUC evidence of its Traffic Control Plan for the Proposed Project and any associated permits with regard to emergency vehicle access upon approval and receipt from appropriate permitting agencies. Streets crossing the ROW Traffic control plans/reports/copies of applicable permits

D.12 Transportation and Traffic

Page D.12-3, under D.12.1.1 Existing Roadway Network —

State Route 125 (SR 125) South primarily will run north-south and will consist of approximately 12 miles of new highway alignment form State Route 905 to State Route 54. State Route 125 South will open initially as a four-lane highway with the south 9.5 miles operated as a toll road. The project calls for the ultimate construction of a six to eight-lane highway plus possible future carpool lanes and/or transit facilities in the median. SR 125 South will also provide interchanges intermittently. SR 125 South is to be constructed near the western edge of the Miguel Substation, west of the modifications that would occur with the Miguel-Mission 230 kV #2 Project.

Business Route 8 is classified as Major Arterial in the County of San Diego Circulation Element. Business Route 8 is currently constructed as a two-lane undivided roadway west of Lake Jennings Park Road providing one lane of travel in each direction. Business Route 8 is signalized at Lake Jennings Park Road. Within the project area, Business Route 8 provides bike lanes (Class II bikeways) and bus stops, while curbside parking is prohibited. The Proposed Project would include an overhead crossing of Business Route 8 just west of Lake Jennings Park Road. Business Route 8 is part of the County of San Diego's bicycle network system.

Clairemont Mesa Boulevard is classified as Major Arterial in the local City of San Diego Community Plan. Clairemont Mesa Boulevard is currently constructed as a four-lane divided roadway providing two lanes of travel in each direction. Within the project area, Clairemont Mesa Boulevard provides bike lanes (Class II bikeways) and bus stops, although curbside parking is prohibited. The Proposed Project would include an overhead crossing east of the Clairemont Mesa Boulevard terminus, just east of Rueda Drive. Clairemont Mesa Boulevard is part of the County of San Diego's bicycle network system.

Dehesa Road is classified as Major Arterial in the County of San Diego Circulation Element. Dehesa Road is currently constructed as a narrow, winding, two-lane undivided roadway, providing one lane of travel in each direction. Dehesa Road is signalized at Willow Glen Drive and has a posted speed limit of 45 mph. Within the project area, Dehesa Road does not provide bike lanes or bus stops and curbside parking is prohibited. The Proposed Project would include an overhead crossing of Dehesa Road just west of Willow Glen Drive. Average daily traffic in 2001 on Dehesa Road between Springtime Way and Willow Glen Drive was 10,800 trips. Dehesa Road is part of the County of San Diego's bicycle network system.

Hillsdale Road is classified as a Collector Road in the County of San Diego Circulation Element. Hillsdale Road is currently constructed as a two-lane undivided roadway, providing one lane of travel in each direction. Hillsdale Road is stop sign controlled at Willow Glen Drive and has a posted speed limit of 45 mph. Within the project area, Hillsdale Road provides bike lanes (Class II bikeways), but does not provide bus stops or allow curbside parking. The Proposed Project would include an overhead crossing of Hillsdale Road just west of the Willow Glen Drive/Hillsdale Road intersection. Average daily traffic in 2002 on Hillsdale Road between Vista Grande Road and Willow Glen Drive was 5,400 trips. Hillsdale Road is part of the County of San Diego's bicycle network system.

Page D.12-4, under D.12.1.1 Existing Roadway Network —

La Cresta Road is classified as a Collector Road in the County of San Diego Circulation Element. La Cresta Road is currently constructed as a two-lane undivided roadway with a TWLTL median from Westward Ho Circle to Coyote Ridge. East of Coyote Ridge, La Cresta Road changes from a two-lane roadway to a three-lane undivided roadway. The addition of the third lane functions as a passing lane and alternates from an eastbound to westbound passing lane and then back to an eastbound passing lane upon reaching La Cresta Boulevard in the community of Crest. The posted speed limit along La Cresta Road ranges between 45 and 55 mph with curbside parking prohibited and bike lanes (Class II bikeways) provided. Within the project area, the Proposed Project would include an overhead crossing of La Cresta Road. Average daily traffic in 2003 on La Cresta Road between Forester Creek Road and Mountain View Road was 7,900 trips. La Cresta Road is part of the County of San Diego's bicycle network system.

Lake Jennings Park Road is classified as Major Arterial in the County of San Diego Circulation Element. Lake Jennings Park Road is currently constructed as a two-lane undivided roadway from I-8 northward to Jack Oak Road, providing one travel lane in each direction. From Jack Oak Road to El Monte Road, Lake Jennings Park Road changes to a three-lane undivided roadway providing one travel lane in the north direction and two travel lanes in the south direction. Within the project area, Lake Jennings Park Road provides bike lanes (Class II bikeways) while curbside parking is prohibited. The Proposed Project would include an overhead crossing of Lake Jennings Park Road just south of the El Monte Road/Lake Jennings Park Road intersection. Average daily traffic in 2002 on Lake Jennings Park Road between El Monte Road and Jack Oak Road was 13,200 trips. Lake Jennings Park Road is part of the County of San Diego's bicycle network system.

Magnolia Avenue is classified as Major Arterial in the City of Santee Circulation Element. North of Princess Joann Road, Magnolia Avenue is classified as a Collector Road. North of Mast Boulevard, Magnolia Avenue is currently constructed as a four-lane divided roadway providing two travel lanes in each direction. Within the project area, Magnolia Avenue provides bike lanes (Class II bikeways) and bus stops with curbside parking generally prohibited. The Proposed Project would include an overhead crossing north of the Magnolia Avenue terminus, just north of Princess Joann Road. Magnolia Avenue is part of the County of San Diego's bicycle network system.

Page D.12-5, under D.12.1.1 Existing Roadway Network —

Tierrasanta Boulevard is classified as Major Arterial in the local City of San Diego Community Plan. Tierrasanta Boulevard is currently constructed as a four-lane divided roadway providing two travel lanes in each direction. Within the project area, Tierrasanta Boulevard provides bike lanes (Class II bikeways) and bus stops, although curbside parking is prohibited. The Proposed Project would include an overhead crossing east of the Tierrasanta Boulevard terminus, east of Colina Dorada. Tierrasanta Boulevard is part of the County of San Diego's bicycle network system.

Page D.12-6, under D.12.2 Applicable Regulations, Plans, and Standards —

Construction of the Proposed Project could potentially affect access, traffic flows, curbside parking and transit routes on public streets and highways. Therefore, it will be necessary for SDG&E and/or the construction contractor to obtain encroachment permits or similar legal agreements from the public agencies responsible for each affected roadway or other transportation ROW. Such permits are needed for ROWs that would be crossed by the transmission line as well as for where transmission line construction activities would require the use of public right-of-way for a parallel installation. For the Proposed Project or any of the alternatives, these encroachment permits would be issued by Caltrans, the County of San Diego, and the City of San Diego., or other affected agencies.

Page D.12-9, in Table D.12-5, Trip Generation During Construction, and accompanying text —

Table D.12-5. Trip Generation During Construction

			AM Peak Hour		ak Hour
Vehicles	ADT	In	Out	ln	Out
100	200	10	10	10	10

Construction of the overhead transmission line portion of the Proposed Project would include crossing public access roadways, highways and freeways along each portion of the project route. Table D.12-5 shows that construction activities related to the Proposed Project would generate approximately 200 average daily trips (ADT) with 10 inbound and 10 outbound trips during the morning peak hour (7:00 to 8:00 a.m.) and 10 inbound and 10 outbound trips during the evening peak hour (4:00 to 5:00 p.m.). It is anticipated that less than 200 average daily trips (ADT) would be generated by the Proposed Project. Table D.12-6 summarizes the average daily LOS designations for each of the impacted roadways.

Page D.12-10, under Impact T-3: Construction Would Cause Physical Impacts to Roads and Sidewalks —

The Proposed Project is not expected to cause any physical damage to public roads or sidewalks because beyond that planned for trenching and excavation operations would occur in specified areasthe ROW. However, there is the potential for unexpected damage by vehicles and equipment to occur as heavy equipment would use public roads and cross sidewalks and roadside drainage structures for access to the ROW or staging areas. This would be potentially significant, but would be reduced to less than significant levels with implementation of Mitigation Measure T-3a (Class II).

Page D.12-12, under Mitigation Measure for Impact T-5, Construction Would Interfere with Emergency Response —

T-5a Ensure emergency response access. SDG&E shall coordinate in advance with emergency service providers local jurisdictions to avoid restricting movements of emergency vehicles. SDG&E shall request that Police police departments, fire departments, ambulance services, and paramedic services shall be notified in advance by SDG&E each jurisdiction of the proposed locations, nature, timing, and duration of any construction activities and advised of any access restrictions that could impact their effectiveness. At locations where access to nearby property is blocked, provision shall be ready at all times to accommodate emergency vehicles, such as plating over excavations, short detours, and alternate routes in conjunction with local agencies. Traffic control plans (Mitigation Measure T-1a) shall include details regarding emergency services coordination and procedures, and copies shall be provided to all relevant service providers. Documentation of coordination with service providers local jurisdictions shall be provided to the CPUC prior to the start of construction.

Page D.12-13, under D.12.4.1 Jamacha Valley 138 kV/69 kV Underground Alternative, "Environmental Impacts and Mitigation Measures," new final paragraph —

During the operational phase of this underground alternative, there would be a potential for traffic disruptions and lane blockages during emergency repair and maintenance activities. Such temporary traffic disruptions during the operations phase of the project would be rare and would be similar to those impacts described above that would occur during the construction phase of the project.

Page D.12-14, under Mitigation Measures for Impact T-7, Underground Construction Would Restrict Access to Properties —

T-7b Coordinate with businesses. If private parking lots serving businesses or institutions would be effectively blocked during construction, SDG&E shall either make prior arrangements with the business owner(s) to provide alternative parking within reasonable walking distance (i.e., no more than 1,000 feet), or shall coordinate the construction schedule so as to prevent disrupting the functions of the business(es) to the maximum extent feasible as determined by the CPUC Mitigation Monitor.

Page D.12-14, under Mitigation Measures for Impact T-7, Underground Construction Would Restrict Access to Properties, "Comparison to Proposed Project" —

Implementation of this alternative would result in a significant amount of additional construction impacts within public road ROWs compared to the Proposed Project's overhead alignment, which would have little direct effect on roadways. This alternative would cause a much greater likelihood of disrupting travel on Willow Glen Drive, and it would cause an additional potentially significant impact by restricting access to properties along the underground route. In addition, maintenance and repair operations associated with this alternative have the potential to induce greater traffic disruption impacts compared to the operations of the Proposed Project.

Page D.12-16, under D.12.4.4 City of Santee 138 kV/69 kV Underground Alternative, "Environmental Impacts and Mitigation Measures," new final paragraph —

During the operational phase of this underground alternative, there would be a potential for traffic disruptions and lane blockages during emergency repair and maintenance activities. Such temporary traffic disruptions during the operations phase of the project would be rare and would be similar to those impacts described above that would occur during the construction phase of the project.

Page D.12-16, under D.12.4.4 City of Santee 138 kV/69 kV Underground Alternative, "Comparison to Proposed Project" —

Implementation of this alternative would result in additional construction within public road ROWs compared to the Proposed Project's overhead alignment, which would have little direct effect on roadways. This alternative would cause a much greater likelihood of disrupting travel on Magnolia Avenue and Princess Joann Road, and it would cause an additional potentially significant impact by restricting access to properties along the underground route. In addition, maintenance and repair operations associated with this alternative have the potential to induce greater traffic disruption impacts compared to the operations of the Proposed Project.

D.13 Visual Resources

Page D.13-118, under Mitigation Measures for Impact V-1, Short-Term Visibility of Construction Activities and Equipment —

- V-1a Reduce visibility of construction activities and equipment. Adjacent to residences, parks, recreation areas, and public schools, ground disturbance due to staging and storage areas shall be screened with temporary fencing of an appropriate design and color. Along the entire ROW, all evidence of construction activities, including ground disturbance due to staging and storage areas, shall be removed and all disturbed areas shall be remedied to an original or improved condition upon completion of construction, including the replacement of any vegetation or paving removed during construction. SDG&E shall submit final construction plans, demonstrating compliance with this measure to the CPUC for review and approval at least 60 days prior to the start of construction.
- V-1b Avoid construction on weekends and holidays near recreation sites and parks. Construction activities shall not occur on weekends or holidays on or adjacent to developed recreation sites and parks.—I, in order to minimize visual impacts from construction activities and at snub/stringing sites, construction shall not occur on weekends or holidays or within 0.25 miles of the following recreation areas and parks: Steele Canyon County Park, recreational resources adjacent to the right-of-way that should be avoided include: Cottonwood at Rancho San Diego Golf Club, Lake Jennings County Park, Santee Lakes County Park, Louis A. Stelzer County Park (if reopened by time construction occurs), Mission Trails Regional Park, and Admiral Baker Golf Course.

Page D.13-123, under Mitigation Measure for Impact V-5, Long-Term Damage to Landscape Resources from Maintenance Activities —

V-5a Reduce direct impacts to, and visual degradation of, exotic landscapes and natural scenic areas for the life of the project. Ground disturbances resulting from routine access to the ROW during the operational life of the project shall be minimized to the extent possible. This measure shall apply to all park and recreation areas, residential areas, and public facilities' landscaped grounds crossed by and adjacent to the ROW. All evidence of maintenance activities, including ground disturbances from the movement and use of vehicles and equipment shall be remedied to an original or improved condition, outside of access roads, including the replacement of any vegetation or paving removed during construction. SDG&E shall submit final maintenance plans, demonstrating compliance with this measure to the CPUC for review and approval at least 60 days prior to the start of construction.

Page D.13-124, under D.13.4.1 Jamacha Valley 138 kV/69 kV Underground Alternative, "Environmental Impacts and Mitigation Measures" —

Visual impacts resulting from this alternative would include short-term construction impacts (Class III) and long-term operational impacts (Class II and III). Long-term visual impacts associated with this alternative are summarized in Table D.13-4 by KOP. Overall, this alternative would result in visual changes that would be similar to, although slightly greater than, the baseline setting and the on-going visual effects of the lines present in SDG&E's existing ROW from approximately the ROW's intersection with Cottonwood at Rancho San Diego Golf Club and Willow Glen Drive to near the intersection of Willow Glen Drive and Dehesa Road. Over the majority of the alternative route, tThis alternative would result in weak visual contrasts and would not substantially increase the visual dominance of the project over existing conditions. The increased number and diameter of the 230 kV conductors would be the most evident visual changes seen by sensitive viewers.

The transition stations would result in long-term visual changes that are assessed as Class III. The transition stations would either consist of tubular steel poles, slightly higher than the proposed 138 kV/69 kV poles, or low profile racks. The EIR analysis assumed the structure type shown in SDG&E's PEA, Figure 3-1. The transition stations would be located on the road shoulder of Willow Glen Road, adjacent to the Rancho San Diego at Cottonwood Golf Club, and near the intersection of Willow Glen Road and Dehesa Road. The visual impacts of these facilities would be localized, and less than significant with mitigation. Visual simulations of this alternative include the following:

- Figure D.13-42, KOP 11 from the Cottonwood residential neighborhood near Hillsdale Drive
- Figure D.13-43, KOP 13 from the Cottonwood residential neighborhood along Vista Rodeo Drive

Page D.13-125, under Impact V-1: Short-Term Visibility of Construction Activities and Equipment —

Construction activities for undergrounding the 138 kV/69 kV line would be most visible along Willow Glen Drive. The transmission lines would be installed in the road shoulder, thereby eliminating the potential for direct impacts to natural or man-made landscapes of aesthetic qualities along Willow Glen Drive. Near the intersection of Willow Glen Drive and Dehesa Road, the 138 kV/69 kV circuits would turn westward, continuing underground in an existing utility access road. All construction impacts would be short-term, as the roadway and natural hillside north of Dehesa Road would be restored to pre-existing conditions. Physical disturbances to native vegetation and rock outcroppings would be avoided or minimized by following the existing access route. This is an adverse but less than significant (Class III) impact. Implementation of Mitigation Measure V-1a is recommended to further reduce the impact because it would result in all evidence of construction activities and disturbances being removed and the slopes restored to pre-existing or improved landscape conditions.

Page D.13-127, under Impact V-6: Long-Term Visibility of Overhead/Underground Transition Stations —

The Jamacha Valley 138 kV/69 kV Underground Alternative would result in long-term visual changes along Willow Glen Drive and Dehesa Road, where the 138 kV/69 kV lines would require transition poles from overhead to underground. Depending on the final pole location, these stations may be visible from residences located north and south of Dehesa Road. Based on the PEA's Figure 3-1, the design of these poles would be similar in height and scale as the proposed 230 kV structures. The visual contrasts of the transition poles would be somewhat greater at these locales resulting in localized moderate to strong contrasts, however, due to the hardware requirements. The impact is potentially significant (Class II); Mitigation Measures V-6a and V-6b are required to reduce impacts to less than significant levels.

Page D.13-127, under Mitigation Measures for Impact V-6, Long-Term Visibility of Overhead/Underground Transition Stations —

V-6a Reduce visual impacts at transition poles/stations. All evidence of construction activities, including ground disturbance due to installation of the overhead to underground transition stations shall be removed and all disturbed areas shall be remedied to an original or improved condition upon completion of construction, including the replacement of any vegetation or paving removed during construction. Long-term visual impacts at the transition sites shall be reduced for the life of the project through color treatment of poles to blend with surrounding landscapes, use of non-specular hardware, and landscaping, as required. SDG&E shall submit final construction, landscaping, and pole/station color treatment plans, demonstrating compliance with this measure to the CPUC for review and approval at least 60 days prior to the start of construction.

Page D.13-136, under City of Santee 138 kV/69 kV Underground Alternative in Table D.13-7. Displaying only the affected row —

Table D.13-7. Summary of Visual Impacts and Mitigation Measures for the City of Santee 138 kV/69 kV Underground Alternative – by KOP

#	КОР	Visual Sensitivity Level	Overall Visual Change Level	Primary Impact Types	Mitigation Measures*	Impact Significance
21	Santee residential area	High	<u>Moderate</u> Low	V-2, V-4, V-6	V-1, V-2b, V-5a, V-6a <u>, V-6b</u> (Recommended)	Class II

Page D.13-135, under D.13.4.4 City of Santee 138 kV/69 kV Underground Alternative, "Environmental Impacts and Mitigation Measures" —

The 69 kV Line. The 69 kV line would be undergrounded from proposed 138 kV/69 kV Poles #1300 to #1330 in the City of Santee. Transition stations would be required at the approximate location of these two structures. From Pole #1300, the 69 kV circuit would be undergrounded in an existing access road for the water storage facility, east of Princess Joann Road, and in Princess Joann Road. The 69 kV circuit would transition overhead approximately 800 feet northwest of the western end of Princess Joann Road northwest of Cuyamaca Street,

[...]

Two transition poles. Two transition poles would be required with this alternative, where the lines would transition between overhead and underground systems. The locations of the transition poles are on predominantly natural hillsides, within the SDG&E ROW.

Page D.13-137, under Impact V-6: Long-Term Visibility of Overhead/Underground Transition Stations —

The City of Santee 138 kV/69 kV Underground Alternative would have long-term visual impacts where transition poles are installed and viewed from residences in the City of Santee. The transition poles that would be required with this alternative would be viewed at distances of 700 feet and greater and would be backscreened against existing natural shrub and rock covered hills. In these landscape settings, visual impacts are considered adverse,—and potentially but less than—significant (Class III). Implementation of Mitigation Measure V-6a and V-6b would be required is recommended to reduce visual impacts to the degree feasible. With implementation of the mitigation measures, tThe visual contrasts of these poles would be weak to moderate when compared to other utility facilities within SDG&E's ROW.

Page D.13-137, under D.13.4.4 City of Santee 138 kV/69 kV Underground Alternative, "Comparison to Proposed Project" —

The City of Santee 138 kV/69 kV Underground Alternative would result in less long-term visual impact than SDG&E's Proposed Project through the City of Santee's residential neighborhood since the existing 138 kV and 69 kV lines and poles would be removed, rather than relocated closer to residential homes on the south side of the ROW. The undergrounding of the 138 kV/69 kV line along Princess Joann Road in an existing access road, east of Princess Joann Road would result in greater short-term construction-related visual impacts along these residential roads, but would reduce the long-term visual impacts to residents living along and north of Princess Joann Road. Long-term visual impacts would be reduced in comparison with the Proposed Project because no new poles would be constructed adjacent

to homes, south of along this stretch of SDG&E's ROW. Visual impacts from the new 230 kV circuits would be the same for both the Proposed Project and the City of Santee 138 kV/69 kV Underground Alternative. The City of Santee 138 kV/69 kV Underground Alternative would require the same installation of the 230 kV line on the modified 138 kV/69 kV lattice structures.

Page D.13-138, under D.13.4.5 City of Santee 230 kV Overhead Northern ROW Boundary Alternative, "Environmental Impacts and Mitigation Measures" —

Under the City of Santee 230 kV Overhead Northern ROW Boundary Alternative, the type and degree of visual impacts to landscape aesthetics and sensitive residential viewers would be modified by the installation of the 230 kV line <u>further</u> away from the residences, <u>located south of the ROW</u>. The 138 kV and 69 kV lines would be as follows:

The new 230 kV Line – Would be installed on two new mono-steel pole structures on the northern side of the ROW.

230 kV Steel Mono-Poles - Two additional 230 kV steel mono-poles would be added to allow cross-over of the circuits at the two endpoints of this alternative.

Page D.13-139, under Impact V-2: Long-Term Visibility of Upgraded/New 230 kV Structures —

Impacts to visual resources resulting from the operation of the new 230 kV mono-pole structures would be long-term. Impacts to residences located south of the ROW would be Class II or Class III, depending on setting and viewing distance. Class II adverse and potentially significant visual impacts would pertain to residences where open foreground views to the elevated ROW and lattice and mono-pole structures occur. Views along Princess Joann Road are representative of these Class II visual impact conditions. Visual impacts to homes located immediately adjacent and south of the ROW would incur Class III adverse, less than significant impacts, however, since this alternative would avoid the placement of two new transmission structures adjacent to their properties. Mitigation Measure V-2b would reduce Class II impacts to adverse, but less than significant levels. These mitigation measures are also recommended for Class III impact to reduce visual impacts to the extent feasible.

Page D.13-140, in Table D.13-9. Mitigation Monitoring Program – Visual Resources —

All mentions of restoring disturbed areas, etc., to "original or improved condition" are changed to "original condition."

After page D.13-144, Figure D.13-32, revised as shown on the following page.



Aspen
Environmental Group

KOP 6: Jamacha Elementary School Proposed Project Simulated View to North

Miguel-Mission 230 kV #2 Project

Figure D.13-32

E. Comparison of Alternatives

Page E-4, in Table E-1. Proposed Project vs. Jamacha Valley Alternatives. Displaying only the affected row -

Table E-1. Proposed Project vs. Jamacha Valley Alternatives					
Issue Area	Proposed Project	Jamacha Valley 138 kV/69 kV Underground Alternative	Jamacha Valley Overhead A Alternative	Jamacha Valley Overhead B Alternative	
Hydrology and Water Quality	Soil erosion and increased sedimentation due to new access roads that would need to be built. Less potential for groundwater impacts.	Preferred because con- struction would occur within paved roadways and would avoid con- struction of access roads to new towers	Greater impacts from soil erosion and increased sedimentation due to construction of new 138 kV/69 kV pole sites and access roads	Greater disturbance due to additional tower construction and removal	

Page E-6, in Table E-2. Proposed Project vs. City of Santee Alternatives. Displaying only the affected row. -

Table E-2. Proposed Project vs. City of Santee Alternatives				
Issue Area	Proposed Project	City of Santee 138 kV/69 kV Underground Alternative	City of Santee 230 kV Overhead Northern ROW Boundary Alternative	
Biological Resources	Slightly less permanent impact. More construction in sensitive areas increasing temporary impacts	Preferred because of <u>a</u> slight reduction in <u>both</u> -temporary <u>impacts</u> and <u>similar</u> permanent impacts as well as reduced need for mitigation	Slightly greater level of construction in sensitive areas than Proposed Project, increasing temporary impacts	

F. Other CEQA Considerations

Page F-6, in Table F-1. Cumulative Scenario – Approved and Pending Projects, "City of Santee" —

Added Site #22a, as follows. Displaying only the affected row.

Table	Table F-1. Cumulative Scenario – Approved and Pending Projects					
Site No.	Project	Project Type	Project Description / Size	Project Location	Permitting Status/Schedule	
<u>22a</u>	Fanita Ranch	Residential	3,000 units on 2,589 acres northern portion of the City of Santee	North of Mast Boulevard, and east of Fanita Parkway and the Sycamore Creek drainage	Planned Estimated date of construction - unknown	

G. Mitigation Monitoring and Reporting

Page G-5, under G.7.2 Construction Personnel —

• SDG&E will prepare contracts that will be signed by the construction companies hired for the project that outline the purposes and procedures for successful mitigation. Similarly SDG&E will have the contract signed by all construction crews and other personnel sign an acknowledgement of their familiarity with adopted mitigation measures prior to working on the job site.

I. Report Preparation

Page I-1, in Table I-1. EIR Preparers and Persons Consulted, under Project Management and Document Production, "Aspen Environmental Group" Displaying only the affected row —

Table I-1. EIR Preparers and Persons Consulted				
Agency / Firm	Personnel by Name and Title	Education	Years Exp.	Issue Area
Project Managen	nent and Document Production			
Aspen Environmental Group	Judy Spicer, Senior Associate Mark Tangard, Administrative Manager	B.A. English B.S. Geography	25 <u>29</u>	Technical Editor Document Production

Appendix 2. Alternatives Screening Report

Page Ap.2-48, under 4.2.2.1 City of Santee 138 kV/69 kV Underground Alternative, "Consideration of CEQA Criteria." Potential to Lessen Significant Environmental Effects — $\frac{1}{2}$

• Biological Resources. This route has the potential to reduce temporary and permanent impacts to biological resources (e.g., coastal sage scrub) because construction would occur in city streets and not within the ROW.

Appendix 3. Biological Technical Appendix

Figure 4-9 of Appendix 3 has been revised as shown on the following page.

Appendix 3, Figure 4-9, revised

CLICK HERE TO VIEW