



California Public Utilities Commission Riverside Transmission Reliability Project

Final Subsequent Environmental Impact Report

VOLUME I

October 2018

State Clearinghouse No. 2007011113

PANORAMA
ENVIRONMENTAL, INC.

717 Market Street, Suite 650 San Francisco, CA 94103 650-373-1200 www.panoramaenv.com

California Public Utilities Commission **Riverside Transmission Reliability Project**

Final Subsequent Environmental Impact Report

State Clearinghouse No. 2007011113

VOLUME I

October 2018

Prepared for:

California Public Utilities Commission
505 Van Ness Avenue
San Francisco, CA 94102

Prepared by:

Panorama Environmental, Inc.
717 Market Street, Suite 650
San Francisco, CA 94103
650-373-1200
rita.wilke@panoramaenv.com

PANORAMA
ENVIRONMENTAL, INC.

717 Market Street, Suite 650 San Francisco, CA 94103 650-373-1200 www.panoramaenv.com

TABLE OF CONTENTS

TABLE OF CONTENTS

Acronyms and Abbreviations	i
Preface.....	P-1
<u>Introduction.....</u>	<u>P-1</u>
<u>Summary of Final Subsequent EIR</u>	<u>P-4</u>
ES Executive Summary.....	ES-1
ES.1 Introduction	ES-1
ES.2 Description of Revised Project and Objectives	ES-8
ES.3 Revised Project Alternatives.....	ES-11
ES.4 Summary of Impacts	ES-14
ES.5 Cumulative and Growth-inducing Impacts and Other CEQA Considerations.....	ES-15
ES.6 Comparison of the Proposed Project and Alternatives	ES-20
ES.7 Impact Summary and Mitigation Table	ES- <u>24</u> <u>23</u>
<u>ES.8 Comments on the Draft Subsequent EIR</u>	<u>ES-33</u> <u>23</u>
1 Introduction.....	1-1
1.1 Project Overview.....	1-1
1.2 Project Background.....	1-2
1.3 Terminology.....	1-11
1.4 Project Objectives	1-11
1.5 Environmental Review Process	1- <u>15</u> <u>14</u>
1.6 Agency Use of this Document	1- <u>17</u> <u>16</u>
1.7 Public Review and Comment.....	1- <u>20</u> <u>19</u>
1.8 <u>Summary of Changes to the Draft Subsequent EIR</u>	<u>1-27</u>
1.9 Reader's Guide to this <u>Final</u> Subsequent EIR	1- <u>27</u> <u>25</u>
1.10 References	1- <u>29</u> <u>26</u>
2 Project Description	2-1
2.1 Introduction	2-1
2.2 Revised Project Components	2-2
2.3 Right-of-Way Requirements.....	2-13
2.4 Construction Activities and Procedures.....	2-13
2.5 Operation and Maintenance	2-24
2.6 Environmental Protection Elements and Mitigation Measures	2-25

TABLE OF CONTENTS

2.7 Electric Magnetic Fields	2-25
2.8 References	2-26
3 Alternatives	3-1
3.1 Introduction	3-1
3.2 Alternatives Development Process	3-1
3.3 Alternatives Screening Methodology	3-3
3.4 Summary of Alternatives Screening Results	3-7
3.5 Alternatives Analyzed in this EIR	3-22
3.6 No Project Alternative	3-31
3.7 Alternatives Eliminated from EIR Consideration	3-31
3.8 References	3-49
4 Environmental Analysis	4-1
Introduction to Environmental Analysis	4-1
Format of Environmental Resource Sections.....	4-3
4.1 Aesthetics.....	4.1-1
4.2 Agriculture and Forestry Resources.....	4.2-1
4.3 Air Quality and Greenhouse Gas Emissions	4.3-1
4.4 Biological Resources.....	4.4-1
4.5 Cultural, Tribal Cultural, and Paleontological Resources	4.5-1
4.6 Geology and Soils	4.6-1
4.7 Hazards and Hazardous Materials	4.7-1
4.8 Hydrology and Water Quality	4.8-1
4.9 Land Use and Planning	4.9-1
4.10 Noise	4.10-1
4.11 Public Services and Utilities	4.11-1
4.12 Recreation	4.12-1
4.13 Transportation and Traffic	4.13-1
5 Cumulative Impacts.....	5-1
5.1 Approach to Cumulative Impact Analysis	5-1
5.2 Cumulative Scenario Projects.....	5-3
5.3 Cumulative Impact Analysis for the revised project	5-13
5.4 Cumulative Impact Analysis for Alternatives.....	5-39
5.5 References	5-50
6 Comparison of Alternatives	6-1
6.1 Introduction	6-1
6.2 CEQA Requirements for Alternatives Comparison	6-1

TABLE OF CONTENTS

6.3 Alternatives Comparison Methodology	6-3
6.4 Evaluation of Project Alternatives	6-4
6.5 Environmentally Superior Alternative	6- <u>19</u> <u>18</u>
7 Additional CEQA Considerations	7-1
7.1 Growth-Inducing Effects	7-1
7.2 Significant Irreversible Changes and Irrecoverable Commitments of Resources.....	7-3
7.3 Significant Environmental Effects that Cannot be Avoided	7-5
7.4 References	7-6
8 Report Preparation	8-1
8.1 List of Preparers.....	8-1
8.2 Agencies and Organizations Contacted	8-2
9 Mitigation Monitoring and Reporting Plan.....	9-1
9.1 Introduction	9-1
9.2 Authority for the MMCRP	9-2
9.3 Organization of the MMCRP	9-2
9.4 Roles and Responsibilities	9-4
9.5 Dispute Resolution.....	9-6
9.6 General Monitoring Procedures	9-6

List of Appendices (Volume II)

Appendix A	Proposed Project Details and Route Maps
Appendix B	Initial Study Checklist
Appendix C	Electromagnetic Field Supplemental Information
Appendix D	Alternatives Screening Report
Appendix E	Detailed Alternative Route Maps
Appendix F	Aesthetics Resources Supporting Information
Appendix G	Air Quality and Greenhouse Gas Supporting Information
Appendix H	Biological Resources Supporting Information
Appendix I	Cultural Resources Supporting Information
Appendix J	Land Use Consistency Table
Appendix K	Corona Noise Technical Memorandum
Appendix L	Transportation and Traffic Supporting Information
Appendix M	Comments and Responses to Comments on the Draft Subsequent EIR
Appendix N	Draft Subsequent EIR Public Review Materials
Appendix O	Agency Correspondence

List of Tables

<u>Table P-1</u>	<u>Contents of the Final Subsequent EIR</u>	<u>P-3</u>
<u>Table P-2</u>	<u>Commenters on the Draft Subsequent EIR</u>	<u>P-4</u>

TABLE OF CONTENTS

Table ES.1-1	Summary of Topics Addressed in the Subsequent EIR	ES-6
Table ES.5-1	Cumulative Impacts of the Project and Alternatives.....	ES-16
Table ES.6-1	Significant and Unavoidable Impacts of the Revised Project and Alternatives.....	ES-21
Table 1.6-1	Potentially Required Permits and Approvals	1- <u>19</u> <u>18</u>
Table 1.7-1	Agencies, Organizations, and Tribes Notified During the Scoping Process	1- <u>21</u> <u>20</u>
Table 1.7-2	Summary of Scoping Comments	1- <u>24</u> <u>23</u>
Table 2.2-1	Summary of Revised Project Transmission Infrastructure and Changes from 2013 Project.....	2-2
Table 2.2-2	Proposed Modifications to Existing Distribution Facilities	2-11
Table 2.4-1	Areas of Temporary and Permanent Disturbance for Revised Project	2-14
Table 2.4-2	Construction Equipment and Workforce Estimates for the Revised Project.....	2-20
Table 2.4-3	Estimated Duration of Construction Activities	2-23
Table 3.4-1	Summary of Alternatives Screening Analysis	3-8
Table 3.5-1	Summary of Alternatives Components and Scope of Activities	3-22
Table 3.5-2	Areas of Temporary and Permanent Disturbance for Alternatives.....	3- <u>23</u> <u>24</u>
Table 3.7-1	Alternative 28 - New 66 kV Power Line Segments	3-47
Table 4-1	Environmental Topics Reconsidered for Analysis	4-2
Table 4.1-1	Scoping Comments Related to Aesthetics Impacts	4.1-1
Table 4.1-2	Definition of Aesthetic Resources Terms.....	4.1-2
Table 4.1-3	Landscape Character Units	4.1-6
Table 4.1-4	Environmental Protection Elements for Aesthetics	4.1-15
Table 4.1-5	Description of Key Observation Points and Viewer Sensitivity	4.1-17
Table 4.1-6	Guidelines for Determining the Significance of Adverse Visual Impact.....	4.1-19
Table 4.1-7	Summary of Revised Project Impacts on Aesthetics	4.1-20
Table 4.1-8	Summary of Visible Revised Project Features	4.1-24
Table 4.1-9	Summary of Visual Impacts for Key Observation Points	4.1-24
Table 4.2-1	Scoping Comments Related to Agriculture and Forestry Impacts.....	4.2-1
Table 4.2-2	FMMP Land Designations in Riverside County.....	4.2- <u>3</u> <u>2</u>
Table 4.2-3	Local Agricultural Land Use and Zoning Designations in the Revised Project Vicinity	4.2-6
Table 4.2-4	Environmental Protection Elements for Agricultural Resources	4.2- <u>7</u> <u>8</u>
Table 4.2-5	Summary of Revised Project Impacts on Agricultural Resources.....	4.2- <u>8</u> <u>9</u>
Table 4.2-6	Areas of Impact on Important Farmland ^a	4.2-10
Table 4.3-1	Scoping Comments Related to Air Quality Impacts.....	4.3-1
Table 4.3-2	NAAQS and CAAQS for Criteria Air Pollutants.....	4.3-6
Table 4.3-3	Air Basin Designations.....	4.3-7
Table 4.3-4	Local Ambient Air Quality Concentrations at Nearby Monitoring Stations	4.3-9
Table 4.3-5	Sensitive Receptors within 1,000 Feet of the Proposed Project	4.3-10
Table 4.3-6	Greenhouse Gas Emission Sources	4.3-14
Table 4.3-7	California Greenhouse Gas Inventory	4.3-14
Table 4.3-8	Environmental Protection Elements for Air Quality and GHG Emissions	4.3-21
Table 4.3-9	SCAQMD Air Quality Significance Thresholds.....	4.3-23
Table 4.3-10	Summary of Proposed Project Impacts on Air Quality and GHG Emissions.....	4.3-27
Table 4.3-11	Unmitigated Maximum Estimated Daily Emissions Generated During Proposed Project Construction (pounds)	4.3-29

TABLE OF CONTENTS

Table 4.3-12	Mitigated Maximum Estimated Daily Emissions Generated During Proposed Project Construction (pounds)	4.3- <u>31</u> <u>30</u>
Table 4.3-13	Unmitigated Maximum Estimated Ambient Pollutant Concentrations During Proposed Project Construction	4.3-32
Table 4.3-14	Mitigated Maximum Estimated Ambient Pollutant Concentrations During Proposed Project Construction	4.3-33
Table 4.3-15	Maximum Estimated Daily Emissions During Project Operations (pounds)	4.3-33
Table 4.3-16	Unmitigated Estimated Ambient Pollutant Concentrations During Proposed Project Underground Construction	4.3-37
Table 4.3-17	Unmitigated Estimated Ambient Pollutant Concentrations During Proposed Project Overhead Construction	4.3-38
Table 4.3-18	Mitigated Estimated Ambient Pollutant Concentrations During Proposed Project Underground Construction	4.3-39
Table 4.3-19	Mitigated Estimated Ambient Pollutant Concentrations During Proposed Project Overhead Construction	4.3-40
Table 4.3-20	Unmitigated Maximum Estimated Daily Emissions Generated During Alternatives 1, 2, and 4 Construction (pounds)	4.3-51
Table 4.3-21	Mitigated Maximum Estimated Daily Emissions Generated During Alternatives 1, 2, and 4 Construction (pounds)	4.3-52
Table 4.3-22	Mitigated Maximum Estimated Daily Emissions Generated During Alternatives 1, 2, and 4 Construction with Additional Limitations (pounds)	4.3-54
Table 4.4-1	Scoping Comments Related to Biological Resource Impacts	4.4-1
Table 4.4-2	Biological Surveys Conducted for the RTRP	4.4-9
Table 4.4-3	Acreage of Vegetation Communities and Cover Types in the GDAD	4.4-12
Table 4.4-4	Special-Status Plants with Moderate or High Potential to Occur in the Biological Survey Area	4.4-14
Table 4.4-5	Special-Status Wildlife with Moderate or High Potential to Occur in the Biological Survey Area	4.4-18
Table 4.4-6	Potential Jurisdictional Waters and Wetlands in the GDAD	4.4-24
Table 4.4-7	Proximity of Critical Habitat within 5 miles of Revised Project Components	4.4-25
Table 4.4-8	Environmental Protection Elements for Biological Resources	4.4-35
Table 4.4-9	Summary of Revised Project Impacts on Biological Resources	4.4-39
Table 4.4-10	Impacts on Vegetation Communities and Cover Types within the Revised Project Area ^a	4.4-41
Table 4.4-11	Revised Project Impacts on Potential Jurisdictional Waters and Wetlands	4.4-48
Table 4.5-1	Scoping Comments Related to Cultural, Tribal Cultural, and Paleontological Resources	4.5-1
Table 4.5-2	Pedestrian Survey Areas	4.5-5
Table 4.5-3	Tribes Consulted	4.5-7
Table 4.5-4	Summary of Prehistoric Periods	4.5-8
Table 4.5-5	Cultural and Historical Resources within 0.25 Mile of the Revised Project Area	4.5-11
Table 4.5-6	Environmental Protection Elements for Cultural, Tribal Cultural, and Paleontological Resources	4.5-20
Table 4.5-7	Summary of Revised Project Impacts on Cultural, Tribal Cultural, and Paleontological Resources	4.5-22
Table 4.6-1	Scoping Comments Related to Geology and Soil Impacts	4.6-1
Table 4.6-2	Geologic Units in the Area of the Alternative Alignments	4.6-4

TABLE OF CONTENTS

Table 4.6-3	Major Soil Units in the Area of the Alternative Alignments	4.6-4
Table 4.7-1	Scoping Comments Related to Hazards and Hazardous Materials Impacts.....	4.7-1
Table 4.7-2	Environmental Protection Elements for Hazards and Hazardous Materials	4.7-15
Table 4.7-3	Summary of Revised Project Impacts from Hazards and Hazardous Materials	4.7-17
Table 4.7-4	<u>Known</u> Underground Utilities Near Alternatives 1 through 4	4.7-27
Table 4.8-1	Scoping Comments Related to Hydrology.....	4.8-1
Table 4.8-2	Waterbodies in the Revised Project Area	4.8-2
Table 4.8-3	Environmental Protection Elements for Hydrology and Water Quality	4.8-10
Table 4.8-4	Summary of Revised Project Impacts on Hydrology and Water Quality	4.8-12
Table 4.9-1	Scoping Comments Related to Land Use and Planning Impacts	4.9-1
Table 4.9-2	Land Use Designations in the Revised Project Area	4.9-3
Table 4.9-3	Zoning in the Revised Project Area	4.9-7
Table 4.9-4	Development Plans Approved by the City of Jurupa Valley	4.9-11
Table 4.9-5	Summary of Revised Project Impacts on Land Use and Planning	4.9-16
Table 4.10-1	Scoping Comments Related to Noise Impacts.....	4.10-1
Table 4.10-2	Summary of Ambient Noise Levels near the Revised Project ^a	4.10-6
Table 4.10-3	Sensitive Receptors within 1,000 feet of the Revised Project	4.10- <u>9</u> <u>8</u>
Table 4.10-4	Groundborne Vibration Impact Thresholds	4.10- <u>12</u> <u>11</u>
Table 4.10-5	Environmental Protection Elements for Noise.....	4.10- <u>15</u> <u>14</u>
Table 4.10-6	Noise-exempted Weekday Construction Hours	4.10- <u>17</u> <u>16</u>
Table 4.10-7	Summary of Revised Project Impacts on Noise.....	4.10- <u>19</u> <u>18</u>
Table 4.10-8	Construction Equipment Noise Levels for the Revised Project	4.10- <u>21</u> <u>20</u>
Table 4.10-9	Vibration Levels for Construction Equipment	4.10- <u>27</u> <u>26</u>
Table 4.10-10	Revised Project Predicted Construction Noise Increases.....	4.10- <u>31</u> <u>30</u>
Table 4.10-11	Sensitive Receptors near Alternative Alignments	4.10- <u>37</u> <u>36</u>
Table 4.11-1	Scoping Comments Related to Public Services and Utilities Impacts	4.11-1
Table 4.11-2	Known Underground Utilities in the Revised Project Area	4.11-2
Table 4.11-3	Landfills that Service the Revised Project Area	4.11- <u>4</u> <u>3</u>
Table 4.11-4	Environmental Protection Elements for Public Services and Utilities	4.11-6
Table 4.11-5	Summary of Revised Project Impacts on Utilities and Service Systems	4.11-8
Table 4.12-1	Scoping Comments Related to Recreation Impacts.....	4.12-1
Table 4.12-2	Environmental Protection Elements for Recreation.....	4.12-11
Table 4.12-3	Summary of Revised Project Impacts on Recreation	4.12-13
Table 4.12-4	Revised Project Construction Impacts on Recreational Facilities.....	4.12-14
Table 4.13-1	Scoping Comments Related to Transportation and Traffic Impacts.....	4.13-1
Table 4.13-2	Level of Service Definitions in the City of Jurupa Valley	4.13-3
Table 4.13-3	Regional Highway.....	4.13-6
Table 4.13-4	Existing Traffic Volumes and LOS in the Revised Project Area	4.13-7
Table 4.13-5	Existing LOS for Intersections in the Revised Project Area.....	4.13-7
Table 4.13-6	Public Transit and School Bus Routes in the Revised Project Area.....	4.13-11
Table 4.13-7	Environmental Protection Elements for Transportation and Traffic	4.13-13
Table 4.13-8	Summary of Revised Project Impacts on Transportation and Traffic	4.13-17
Table 4.13-9	Revised Project Construction Trip Generation ^a	4.13-19
Table 4.13-10	Changes in Level of Service with Revised Project Construction Traffic	4.13-22
Table 4.13-11	Changes in Level of Service with Pats Ranch Road Closure	4.13-24
Table 4.13-12	Changes in Level of Service with Construction Traffic and Pats Ranch Road Lane Closures	4.13-26
Table 4.13-13	Changes in Daily Traffic Volumes with Revised Project Construction Traffic.....	4.13-28

TABLE OF CONTENTS

Table 4.13-14	Limonite Avenue at Pats Ranch Road Lane Closure Queues	4.13-34
Table 4.13-15	Alternative Underground Transmission Line Locations within Roadways	4.13- <u>44</u> <u>43</u>
Table 4.13-16	Baseline Conditions (2021) Traffic Volumes and LOS in the Alternatives Area	4.13- <u>46</u> <u>45</u>
Table 4.13-17	Changes in Daily Traffic Volumes with Alternative 1 Construction Traffic.....	4.13- <u>52</u> <u>51</u>
Table 4.13-18	Cantu-Galleano Ranch Road at Wineville Avenue Closure Queues	4.13- <u>56</u> <u>55</u>
Table 4.13-19	Changes in Level of Service with Alternative 2 Construction Traffic and Limonite Avenue Lane Closures	4.13-63
Table 4.13-20	Changes in Daily Traffic Volumes with Alternative 2 Construction Traffic.....	4.13- <u>65</u> <u>64</u>
Table 5.2-1	Cumulative Scenario Projects in the Revised Project Area.....	5-4
Table 5.4-1	Cumulative Scenario Projects Near Alternative Alignments.....	5-41
Table 5.4-2	Cumulative Analysis of Alternatives	5-47
Table 6.4-1	Summary of Significant and Unavoidable Impacts of the Revised Project.....	6-4
Table 6.4-2	Comparison of Revised Project and Alternative 1 Significant and Unavoidable Impacts within the Area of Comparison.....	6-8
Table 6.4-3	Summary of Revised Project and Alternative 2 Significant and Unavoidable Impacts within the Area of Comparison	6-12
Table 6.4-4	Summary of Significant and Unavoidable Impacts of the Revised Project and Alternative 3 within Area of Comparison	6-15
Table 6.4-5	Summary of Significant and Unavoidable Impacts of the Revised Project and Alternative 4 within the Area of Comparison.....	6-16
Table 6.5-1	Summary of Significant and Unavoidable Impacts of the Revised Project and Alternatives.....	6-19
Table 6.5-2	Summary of Rankings for the Revised project and the Alternatives by Long-term and Short-term Impacts.....	6-21
Table 6.5-3	Summary of Significant and Unavoidable Impacts of the Alternative 1 and No Project Alterative.....	6-23
Table 7.3-1	Summary of Significant and Unavoidable Impacts of the Revised Project	7-6
Table 8.1-1	Consultant Team.....	8-1
Table 8.1-2	Subconsultant Teams	8-2
Table 8.2-1	Local Agencies and Organizations Consulted	8-2
Table 9.6-1	Mitigation Monitoring and Reporting Plan.....	9-9

List of Figures

Figure ES.1-1	Revised and Proposed Project Elements	ES-3
Figure ES.2-1	Project Location.....	ES-9
Figure ES.3-1	Revised Project Alternatives.....	ES-12
Figure 1.2-1	Riverside Transmission Reliability Project (RTRP) Region	1-3
Figure 1.2-2	Previously Proposed Transmission Line Route Analyzed in the 2013 RTRP EIR.....	1-5
Figure 1.2-3	Revised Project Overview.....	1-9
Figure 1.4-1	Relationship Between RTRP, Proposed Project, and Revised Project.....	1- <u>13</u> <u>12</u>
Figure 2.2-1	Revised Project: Relocated Overhead Alignment.....	2-4
Figure 2.2-2	Typical Lattice Steel Tower	2-6
Figure 2.2-3	Typical Tubular Steel Pole	2-7

TABLE OF CONTENTS

Figure 2.2-4	Typical Transmission Line Riser Pole	2-8
Figure 2.2-5	Revised Project: New Underground Transmission Duct Bank Alignment	2-9
Figure 2.2-6	Typical 230-kV Double-Circuit Underground Duct Bank Configuration	2-10
Figure 2.2-7	Distribution Line Relocations #7 and #8.....	2-12
Figure 2.4-1	Distribution Line Riser Pole.....	2-17
Figure 3.2-1	Alternatives Considered in this Subsequent EIR	3-2
Figure 3.5-1	Alternative 1: Bellegrave – Pats Ranch Road Underground	3- 26 <ins>25</ins>
Figure 3.5-2	Alternative 2: Wineville – Limonite Underground	3-27
Figure 3.5-3	Alternative 3: Relocate Northern Riser Poles	3-29
Figure 3.5-4	Alternative 4: Wineville-Landon Underground	3-30
Figure 3.7-1	Eliminated Transmission Route Alternatives	3-33
Figure 3.7-2	Eliminated Non-Wire and System Alternatives	3-35
Figure 3.7-3	Lower Voltage Alternative A.....	3-46
Figure 3.7-4	Lower Voltage Alternative B	3-48
Figure 3.8-1	Lower Voltage Alternative C	3-50
Figure 4.1-1	Landscape Character Units (Map 1 of 2)	4.1-4
Figure 4.1-2	Landscape Character Units (Map 2 of 2)	4.1-5
Figure 4.1-3	Key Observation Point Locations.....	4.1-18
Figure 4.1-4	KOP 1 – Baseline Photograph – Cantu-Galleano Ranch Road Looking West.....	4.1-26
Figure 4.1-5	KOP 1 – Photosimulation (After Revised Project) – Cantu-Galleano Ranch Road Looking West	4.1-27
Figure 4.1-6	KOP 2 – Baseline Photograph – Wineville Avenue Looking North	4.1-28
Figure 4.1-7	KOP 2 – Photosimulation (After Revised Project) – Wineville Avenue Looking North <u>(Revised)</u>	4.1-29
Figure 4.1-8	KOP 3 – Baseline Photograph – Rosebud Lane Looking West	4.1-30
Figure 4.1-9	KOP 3 – Photosimulation (After Revised Project) – Rosebud Lane Looking West <u>(Revised)</u>	4.1-31
Figure 4.1-10	KOP 4 – Baseline Photograph – Vernola Park Looking Southwest.....	4.1-32
Figure 4.1-11	KOP 4 – Photosimulation (After Revised Project) – Vernola Park Looking Southwest <u>(Revised)</u>	4.1-33
Figure 4.1-12	KOP 5 – Baseline Photograph – Limonite Avenue Park-and-Ride Looking North	4.1-34
Figure 4.1-13	KOP 5 – Photosimulation (After Revised Project) – Limonite Avenue Park-and-Ride Looking North	4.1-35
Figure 4.1-14	KOP 6 – Baseline Photograph – Limonite Avenue at Pats Ranch Road Looking Northwest.....	4.1-36
Figure 4.1-15	KOP 6 – Photosimulation (After Revised Project) – Limonite Avenue at Pats Ranch Road Looking Northwest.....	4.1-37
Figure 4.1-16	KOP 7 – Baseline Photograph – Goose Creek Golf Club Driving Range Looking Southeast.....	4.1-38
Figure 4.1-17	KOP 7 – Photosimulation (After Revised Project) – Goose Creek Golf Club Driving Range Looking Southeast	4.1-39
Figure 4.1-18	KOP 8 – Baseline Photograph – Norco Riding and Hiking Trail Looking North	4.1-40
Figure 4.1-19	KOP 8 – Photosimulation (After Revised Project) – Norco Riding and Hiking Trail Looking North <u>(Revised)</u>	4.1-41
Figure 4.1-20	KOP 1 – Baseline Photograph – Cantu-Galleano Ranch Road Looking West.....	4.1-50
Figure 4.1-21	KOP 1 –Photosimulation (After Alternative 1, 2, or 4) – Cantu-Galleano Ranch Road Looking West	4.1-51
Figure 4.1-22	KOP 4 – Baseline Photograph – Vernola Park Looking Southwest.....	4.1-54

TABLE OF CONTENTS

Figure 4.1-23	KOP 4 – Photosimulation (After Alternative 3) – Vernola Park Looking Southwest <u>(Revised)</u>	4.1-55
Figure 4.1-24	KOP 5 – Baseline Photograph – Limonite Avenue Park-and-Ride Looking North	4.1-56
Figure 4.1-25	KOP 5 – Photosimulation (After Alternative 3) – Limonite Avenue Park-and-Ride Looking North	4.1-57
Figure 4.1-26	KOP 6 – Baseline Photograph – Limonite Avenue at Pats Ranch Road Looking Northwest.....	4.1-58
Figure 4.1-27	KOP 6 – Photosimulation (After Alternative 3) – Limonite Avenue at Pats Ranch Road Looking Northwest.....	4.1-59
Figure 4.1-28	KOP 3 – Baseline Photograph – <u>Vernola Park Rosebud Lane</u> Looking <u>Southwest West (Revised)</u>	4.1-62
Figure 4.1-29	KOP 3 – Photosimulation (After Alternative 4) – <u>Vernola Park Rosebud Lane</u> Looking <u>Southwest West (Revised)</u>	4.1-63
Figure 4.2-1	Important Farmland in the Revised Project Area (Map 1 of 2)	4.2-4
Figure 4.2-2	Important Farmland in the Revised Project Area (Map 2 of 2)	4.2-5
Figure 4.3-1	Sensitive Receptors within 1,000 Feet of the Proposed Project (Map 1 of 2).....	4.3-11
Figure 4.3-2	Sensitive Receptors within 1,000 Feet of the Proposed Project (Map 2 of 2).....	4.3-12
Figure 4.3-3	Ambient Pollutant Concentrations Modeling Locations	4.3-36
Figure 4.3-4	Sensitive Receptors within 1,000 Feet of Alternatives 1 Through 4	4.3-48
Figure 4.4-1	Biological Survey Area: Relocated Overhead Transmission Alignment and Marshalling Yard	4.4-4
Figure 4.4-2	Biological Survey Area: Underground Transmission Alignment.....	4.4-5
Figure 4.4-3	Biological Survey Area: Distribution Line Relocation #7	4.4-6
Figure 4.4-4	Biological Survey Area: Distribution Line Relocation #8	4.4-7
Figure 4.4-5	MSHCP Criteria Cells within the Revised Project Area	4.4-31
Figure 4.4-6	MSHCP Criteria Cells in the Revised Project Area.....	4.4-32
Figure 4.4-7	Permanent Wetland Impact Area in Goose Creek Golf Club: Underground Transmission Alignment	4.4-50
Figure 4.5-1	Paleontological Sensitivity in the Revised Project Area (1 of 2)	4.5-13
Figure 4.5-2	Paleontological Sensitivity in the Revised Project Area (2 of 2)	4.5-14
Figure 4.5-3	Paleontological Sensitivity near the Alternative Alignments.....	4.5-38
Figure 4.6-1	Geologic Units in the Area of the Alternatives	4.6-2
Figure 4.6-2	Soil Types in the Area of the Alternatives	4.6-3
Figure 4.6-3	Major Faults in the Jurupa Valley Region	4.6-6
Figure 4.8-1	Surface Waters in the Revised Project Area (Map 1 of 2)	4.8-3
Figure 4.8-2	Surface Waters in the Revised Project Area (Map 2 of 2)	4.8-4
Figure 4.9-1	Land Use Designations in the Revised Project Area (Map 1 of 2)	4.9-5
Figure 4.9-2	Land Use Designations in the Revised Project Area (Map 2 of 2)	4.9-6
Figure 4.9-3	Zoning Designations in the Revised Project Vicinity (Map 1 of 2)	4.9-9
Figure 4.9-4	Zoning Designations in the Revised Project Vicinity (Map 2 of 2)	4.9-10
Figure 4.9-5	Land and Water Conservation Fund Boundaries in the Revised Project Area.....	4.9-13
Figure 4.10-1	Typical Noise Levels in the Environment	4.10-3
Figure 4.10-2	Noise Measurements and Sensitive Receptors near the Revised Project (1 of 2)	4.10- <u>10</u> ⁹
Figure 4.10-3	Noise Measurements and Sensitive Receptors near the Revised Project (2 of 2)	4.10- <u>11</u> ¹⁰
Figure 4.12-1	Recreational Areas in the Revised Project Area (Map 1 of 2).....	4.12-3
Figure 4.12-2	Recreational Areas in the Revised Project Area (Map 2 of 2).....	4.12-4

TABLE OF CONTENTS

Figure 4.13-1	Regional Roadway Network	4.13-5
Figure 4.13-2	Local Roadway Segments and Intersections in the Revised Project Area.....	4.13-8
Figure 4.13-3	Bicycle Facilities, Public Transit Routes, and School Bus Service Area in the Revised Project Area	4.13-10
Figure 4.13-4	Revised Project Construction Trip Distribution	4.13-21
Figure 4.13-5	Local Roadway Segments in the Alternatives Area.....	4.13- 45 <ins>44</ins>
Figure 4.13-6	Alternative 1 Construction Trip Distribution	4.13- 49 <ins>48</ins>
Figure 4.13-7	Alternative 2 Construction Trip Distribution	4.13- 62 <ins>61</ins>
Figure 4.13-8	Alternative 3 Construction Trip Distribution	4.13- 73 <ins>72</ins>
Figure 4.13-9	Alternative 4 Construction Trip Distribution	4.13- 77 <ins>76</ins>
Figure 5.2-1	Cumulative Projects near the Revised Project (Map 1 of 2) <u>Revised</u>	5-11
Figure 5.2-2	Cumulative Projects near the Revised Project (Map 2 of 2)	5-12
Figure 5.4-1	Cumulative Projects near Project Alternatives <u>(Revised)</u>	5-46
Figure 6.4-1	Alternative 1 and the Relevant Area of Comparison	6-7
Figure 6.4-2	Alternative 2 and the Relevant Area of Comparison	6-10
Figure 6.4-3	Alternative 3 and Revised Project Relevant Area of Comparison.....	6-14
Figure 6.4-4	Alternative 4 and the Relevant Area of Comparison	6-17

TABLE OF CONTENTS