

# TABLE OF CONTENTS

## VOLUME 1

Section	Page
<b>LIST OF ABBREVIATIONS</b> .....	xi
<b>1 INTRODUCTION</b> .....	<b>1-1</b>
1.1 Project Location.....	1-1
1.2 Purpose of the Environmental Impact Report .....	1-1
1.3 Environmental Review Process .....	1-2
1.4 Scope and Organization of the Draft EIR .....	1-9
1.5 Terminology Used in This EIR.....	1-10
<b>2 EXECUTIVE SUMMARY</b> .....	<b>2-1</b>
2.1 Introduction.....	2-1
2.2 Summary Description of the Project .....	2-1
2.3 Required Permits and Approvals.....	2-3
2.4 Summary of Alternatives.....	2-4
2.5 Areas of Controversy .....	2-5
2.6 Issues to Be Resolved.....	2-6
2.7 Summary of Environmental Impacts and Recommended Mitigation Measures.....	2-6
<b>3 PROJECT DESCRIPTION</b> .....	<b>3-1</b>
3.1 Overview.....	3-1
3.2 Project Location.....	3-1
3.3 Background.....	3-1
3.4 Goals and Objectives.....	3-5
3.5 Plan Characteristics .....	3-8
3.6 Other Supporting Infrastructure .....	3-64
3.7 Required Permits and Approvals.....	3-72
3.8 Off-Site Roadway Widening and Extension Identified as Mitigation .....	3-79
<b>4 AFFECTED ENVIRONMENT, ENVIRONMENTAL CONSEQUENCES, AND MITIGATION MEASURES</b> .....	<b>4-1</b>
4.0 Approach to the Environmental Analysis .....	4-1
4.1 Aesthetics.....	4.1-1
4.2 Agricultural Resources .....	4.2-1
4.3 Air Quality .....	4.3-1
4.4 Biological Resources .....	4.4-1
4.5 Archaeological, Historical, and Tribal Cultural Resources .....	4.5-1
4.6 Geology and Soils .....	4.6-1
4.7 Greenhouse Gas Emissions.....	4.7-1

## VOLUME 2

Section	Page
4.8 Hazards and Hazardous Materials .....	4.8-1
4.9 Hydrology and Water Quality.....	4.9-1
4.10 Land Use .....	4.10-1
4.11 Noise .....	4.11-1
4.12 Population and Housing.....	4.12-1

4.13	Public Services.....	4.13-1
4.14	Transportation and Circulation.....	4.14-1
4.15	Utilities .....	4.15-1
4.16	Energy.....	4.16-1
<b>5</b>	<b>OTHER CEQA-MANDATED SECTIONS.....</b>	<b>5-1</b>
5.1	Significant and Unavoidable Impacts.....	5-1
5.2	Significant Irreversible Changes.....	5-4
5.3	Growth-Inducing Impacts .....	5-5
5.4	Potential Environmental Impacts Resulting from Mitigation Measures .....	5-7
<b>6</b>	<b>PROJECT ALTERNATIVES .....</b>	<b>6-1</b>
6.1	Introduction.....	6-1
6.2	Considerations for Selection of Alternatives.....	6-2
6.3	Alternatives Considered but Dismissed from Further Evaluation .....	6-7
6.4	Alternatives Selected for Detailed Analysis .....	6-8
6.5	Environmentally Superior Alternative .....	6-28
<b>7</b>	<b>LIST OF PREPARERS .....</b>	<b>7-1</b>
<b>8</b>	<b>REFERENCES .....</b>	<b>8-1</b>

### Appendices (included in a CD on the back cover of Volume 2)

Appendix A	Notice of Preparation and Comments
Appendix B	Sunset Area Water, Wastewater, and Recycled Water Technical Report
Appendix C	Sunset Area Plan Storm Drainage Technical Report
Appendix D	Volumetric Retention Studies
Appendix E	Sunset Area Electric, Natural Gas, Telecommunications Technical Dry Utilities Analysis
Appendix F	Placer Ranch Specific Plan Potable Water Master Plan
Appendix G	Placer Ranch Specific Plan Recycled Water Master Plan
Appendix H	Placer Ranch Specific Plan Sanitary Sewer Master Plan
Appendix I	Placer Ranch Specific Plan Storm Drainage Master Plan
Appendix J	SCS Engineers Odor Studies
Appendix K	Air Quality and Greenhouse Gas Emissions Modeling Results
Appendix L	Noise Measurement Data and Noise Modeling Calculations
Appendix M	Sunset Area Plan and Placer Ranch Specific Plan Transportation Impact Study
Appendix N	Water Supply Assessments for SAP Area and PRSP Area
Appendix O	Wastewater Flow Studies
Appendix P	Memoranda Providing Updates for Revised PRSP Land Use Plan

## Exhibits

Exhibit 1-1	Original PRSP Land Use Plan.....	1-5
Exhibit 1-2	Proposed PRSP Land Use Plan.....	1-6
Exhibit 3-1	Project Vicinity .....	3-2
Exhibit 3-2	Project Location.....	3-3
Exhibit 3-3	Project Area.....	3-4
Exhibit 3-4	SAP Thematic Districts.....	3-10
Exhibit 3-5	SAP Land Use Diagram .....	3-12
Exhibit 3-6	Sunset Area Plan Zoning Map .....	3-17
Exhibit 3-7	Circulation Diagram.....	3-23
Exhibit 3-8	SAP Bicycle and Pedestrian Mobility Plan.....	3-25
Exhibit 3-9	PRSP Districts.....	3-30
Exhibit 3-10	Campus Concept Plan.....	3-31
Exhibit 3-11	PRSP Land Use Plan.....	3-33
Exhibit 3-12	Phase 1 University Development (Approximate Location).....	3-36
Exhibit 3-13	PRSP Parks and Open Space Plan .....	3-40
Exhibit 3-14	School District Boundaries and PRSP School Sites .....	3-42
Exhibit 3-15	PRSP Roadways.....	3-46
Exhibit 3-16	PRSP Traffic Control .....	3-47
Exhibit 3-17	PRSP Bicycle and Pedestrian Mobility Plan .....	3-48
Exhibit 3-18	PRSP Public Transit Facilities .....	3-50
Exhibit 3-19	PRSP Potable Water Infrastructure .....	3-52
Exhibit 3-20	PRSP Recycled Water Infrastructure.....	3-54
Exhibit 3-21	PRSP Wastewater Infrastructure.....	3-56
Exhibit 3-22	PRSP Stormwater Drainage Infrastructure .....	3-59
Exhibit 3-23	PRSP Electrical Infrastructure .....	3-63
Exhibit 3-24	PRSP-Related Infrastructure Located Outside the PRSP Area .....	3-65
Exhibit 3-25	Off-Site Volumetric Drainage Facilities for SAP and PRSP.....	3-68
Exhibit 3-26	Pleasant Grove Retention Facility Conceptual Expansion to Accommodate PRSP and SAP Area Stormwater Volume.....	3-70
Exhibit 4.0-1	Locations of Cumulative Projects.....	4-11
Exhibit 4.1-1	Viewpoints in SAP Area .....	4.1-7
Exhibit 4.1-2	Views from Viewpoints 1 and 2 .....	4.1-8
Exhibit 4.1-3	Views from Viewpoints 3a and 3b.....	4.1-9
Exhibit 4.1-4	Views from Viewpoints 4a and 4b.....	4.1-10
Exhibit 4.1-5	Views from Viewpoints 5 and 6 .....	4.1-11

Exhibit 4.2-1	SAP Farmland Categories .....	4.2-4
Exhibit 4.2-2	Pleasant Grove Retention Facility Farmland Categories .....	4.2-5
Exhibit 4.3-1	Odor Complaints.....	4.3-9
Exhibit 4.4-1	Existing Reserve, Preserve, and Open Space Areas .....	4.4-3
Exhibit 4.4-2	Land Cover .....	4.4-5
Exhibit 4.4-3	Special-Status Species within 5 Miles of Project Area.....	4.4-13
Exhibit 4.4-4	Critical Habitat.....	4.4-21
Exhibit 4.4-5	Wetland Impact Map.....	4.4-38
Exhibit 4.4-6	Vernal Pool Recovery Core Areas and Placer County Development Area .....	4.4-76
Exhibit 4.6-1	Soil Types in the Project Area .....	4.6-5
Exhibit 4.8-1	Regulated Hazardous Materials Sites in the SAP Area .....	4.8-3
Exhibit 4.8-2	Fire Hazard Severity Zones .....	4.8-14
Exhibit 4.9-1	Watershed and Flood Zone Map .....	4.9-3
Exhibit 4.9-2	Map of Flood Zones.....	4.9-4
Exhibit 4.11-1	Existing Sensitive Land Uses .....	4.11-8
Exhibit 4.11-2	Roseville Power Plant 2 Noise Contours.....	4.11-35
Exhibit 4.11-3	Placer Ranch Specific Plan Roadway Noise Contours .....	4.11-46
Exhibit 4.13-1	Existing Fire Station and Law Enforcement Office Facilities .....	4.13-3
Exhibit 4.13-2	School Districts and Schools Near the Sunset Area Plan and Placer Ranch Specific Plan .....	4.13-6
Exhibit 4.13-3	Parks Near the Sunset Area Plan and Placer Ranch Specific Plan.....	4.13-8
Exhibit 4.13-4	Libraries Near the Sunset Area Plan and Placer Ranch Specific Plan.....	4.13-10
Exhibit 4.14-1	Study Area.....	4.14-4
Exhibit 4.14-2	Existing Roadway Network.....	4.14-5
Exhibit 4.14-3	Average Daily Traffic – Existing Conditions.....	4.14-7
Exhibit 4.14-4	Existing Transit Facilities.....	4.14-23
Exhibit 4.14-5	Existing Bicycle Facilities.....	4.14-24
Exhibit 4.14-6	Placer Ranch Specific Plan Roadway Network.....	4.14-37
Exhibit 4.14-7	Sunset Area Plan Roadway Network.....	4.14-38
Exhibit 4.14-8	Average Daily Traffic – Existing Plus Project Buildout Conditions.....	4.14-44
Exhibit 4.14-9	Change in Average Daily Traffic – Existing and Existing Plus Project Buildout Conditions .....	4.14-45

Exhibit 4.14-10	Average Daily Traffic – Existing Plus Placer Ranch Specific Plan Conditions.....	4.14-46
Exhibit 4.14-11	Change in Average Daily Traffic – Existing and Existing Plus Placer Ranch Specific Plan Conditions.....	4.14-47
Exhibit 4.14-12	Cumulative No Project Roadway Network .....	4.14-97
Exhibit 4.14-13	Average Daily Traffic – Cumulative No Project Conditions .....	4.14-98
Exhibit 4.14-14	Cumulative Plus Placer Ranch Specific Plan Roadway Network.....	4.14-99
Exhibit 4.14-15	Average Daily Traffic – Cumulative Plus Placer Ranch Specific Plan Conditions.....	4.14-100
Exhibit 4.14-16	Change in Average Daily Traffic – Cumulative Plus Placer Ranch Specific Plan and Cumulative No Project Conditions.....	4.14-101
Exhibit 4.14-17	Cumulative Plus PRSP Plus SAP (20-Year Project) Roadway Network.....	4.14-103
Exhibit 4.14-18	Average Daily Traffic – Cumulative Plus PRSP Plus SAP (20-Year Project) Conditions	4.14-104
Exhibit 4.14-19	Change in Average Daily Traffic – Cumulative Plus PRSP Plus SAP (20-Year Project) and Cumulative No Project Conditions .....	4.14-105
Exhibit 4.14-20	Cumulative Plus SAP Buildout Roadway Network .....	4.14-107
Exhibit 4.14-21	Average Daily Traffic – Cumulative Plus SAP Buildout Conditions .....	4.14-108
Exhibit 4.14-22	Change in Average Daily Traffic – Cumulative Plus SAP Buildout and Cumulative No Project Conditions .....	4.14-109
Exhibit 4.14-23	Change in Average Daily Traffic – Cumulative Plus SAP Buildout and Cumulative Plus PRSP Plus SAP (20-Year Project) Conditions.....	4.14-111
Exhibit 4.15-1	Existing Water Supply System .....	4.15-3
Exhibit 4.15-2	Existing Wastewater Collection and Treatment Infrastructure.....	4.15-10
Exhibit 4.15-3	South Placer Wastewater Authority Partner Agencies, 2005 Regional Service Area Boundary, Ultimate Service Area Boundary, and Urban Growth Areas as Analyzed in the Systems Evaluation.....	4.15-11
Exhibit 4.15-4	Sunset Area Potable Water System .....	4.15-41
Exhibit 4.15-5	Sunset Area Plan Wastewater System.....	4.15-44
Exhibit 6-1	1997 SIA Plan Land Use Diagram.....	6-11
Exhibit 6-2	Alternative 3: Reduced Footprint, Reduced Development Potential .....	6-17
Exhibit 6-3	Alternative 4: Reduced Footprint, Similar Development Potential.....	6-23

## Tables

Table 1-1	Comparison of Original and Revised Land Uses and Development Assumptions .....	1-4
Table 2-1	Summary of Impacts and Mitigation Measures .....	2-7
Table 3-1	SAP Development Density by Land Use Designation.....	3-15
Table 3-2	SAP Roadway Functional Classification .....	3-24
Table 3-3	Projected 20-Year Development with Full PRSP Buildout .....	3-28
Table 3-4	PRSP Land Use Designation Summary .....	3-34

Table 3-5	PRSP Job Generation Estimates.....	3-34
Table 3-6	PRSP Residential Population Estimate .....	3-38
Table 3-7	Summary of Parks and Open Space Requirements and Credits.....	3-41
Table 3-8	PRSP Student Generation Estimates .....	3-43
Table 3-9	Utilities Providers for the Project .....	3-51
Table 4.0-1	Geographic Scope of Cumulative Impacts.....	4-8
Table 4.0-2	Cumulative Project List .....	4-9
Table 4.2-1	Farmland Classification Acreages .....	4.2-3
Table 4.3-1	Attainment Status Designations for Placer County .....	4.3-3
Table 4.3-2	Summary of Annual Air Quality Data (2014–2016).....	4.3-3
Table 4.3-3	Odor Complaints by Year Attributed to the Western Regional Sanitary Landfill.....	4.3-8
Table 4.3-4	Ambient Air Quality Standards.....	4.3-12
Table 4.3-5	Summary of Maximum Daily Emissions of Criteria Air Pollutants and Ozone Precursors Associated with Project Construction (Unmitigated).....	4.3-29
Table 4.3-6	Summary of Maximum Daily Emissions of Criteria Air Pollutants and Ozone Precursors Associated with Project Construction (Mitigated).....	4.3-34
Table 4.3-7	Summary of Maximum Daily Operational Emissions of Criteria Air Pollutants and Precursors at Full Buildout of the Net SAP Area (Unmitigated).....	4.3-35
Table 4.3-8	Summary of Maximum Daily Operational Emissions of Criteria Air Pollutants and Ozone Precursors at Full Buildout (2041) of PRSP Area (Unmitigated).....	4.3-36
Table 4.3-9	Summary of Maximum Daily Operational Emissions of Criteria Air Pollutants and Precursors at Full Buildout of the Net SAP Area (Mitigated).....	4.3-40
Table 4.3-10	Summary of Maximum Daily Operational Emissions of Criteria Air Pollutants and Ozone Precursors at Full Buildout (2041) of the Placer Ranch Specific Plan (Mitigated).....	4.3-41
Table 4.3-11	Maximum Mobile-Source CO Concentrations at Intersections with Highest Traffic Volumes .....	4.3-42
Table 4.4-1	Communities and Land Cover Types in the Sunset Area Plan and within the Placer Ranch Specific Plan Area, as mapped for the Placer County Conservation Plan.....	4.4-6
Table 4.4-2	Special-Status Plant Species Known to Occur or with Potential to Occur in the Project Area .....	4.4-14
Table 4.4-3	Special-Status Animal Species Known to Occur in the Project Region and their Potential for Occurrence in the Project Area .....	4.4-15
Table 4.4-4	Summary of Impacts and Preservation of Land Cover Types Containing Aquatic Resources for the Net SAP.....	4.4-35
Table 4.4-5	Summary of Aquatic Resources Impacts and Preservation for the Placer Ranch Specific Plan .....	4.4-36
Table 4.5-1	SAP Pre-historic and Historic Sites .....	4.5-6

Table 4.5-2	Summary of AB 52 Consultation Efforts .....	4.5-11
Table 4.6-1	Soil Types in the SAP Area .....	4.6-4
Table 4.6-2	Soil Types in the PRSP Area.....	4.6-6
Table 4.6-3	Soil Types in Other Supporting Infrastructure Areas .....	4.6-7
Table 4.6-4	Paleontological Sensitivity of Geologic Units Underlying the SAP Area.....	4.6-9
Table 4.7-1	Unmitigated Construction-Generated Greenhouse Gas Emissions .....	4.7-17
Table 4.7-2	Unmitigated Operational Greenhouse Gas Emissions for Net SAP Area and PRSP Area at Full Buildout.....	4.7-19
Table 4.7-3	Mitigated Operation-Related Greenhouse Gas Emissions.....	4.7-23
Table 4.9-1	Water Quality Objectives for Hydrologic Unit 520.00, Colusa Basin Drain to Eye [“I”] Street Bridge .....	4.9-10
Table 4.9-2	Net SAP Area Impervious Surfaces and Runoff Increase from the 100-Year, 8-Day Runoff/Retention Volume .....	4.9-27
Table 4.9-3	Impervious Surfaces and 100-Year, 8-Day Runoff/Retention Volume in the PRSP Area.	4.9-29
Table 4.10-1	SIA Land Use Designations .....	4.10-4
Table 4.10-2	SIA Zoning .....	4.10-6
Table 4.11-1	Typical A-Weighted Noise Levels .....	4.11-3
Table 4.11-2	Human Response to Different Levels of Ground Noise and Vibration.....	4.11-5
Table 4.11-3	Modeled Existing Roadway Noise Levels .....	4.11-6
Table 4.11-4	Caltrans Recommendations Regarding Vibration Levels.....	4.11-10
Table 4.11-5	Placer County Allowable $L_{dn}$ Noise Levels in Specified Zone Districts <sup>1</sup> Applicable to New Projects Affected by or Including Nontransportation Noise Sources.....	4.11-10
Table 4.11-6	Placer County Maximum Allowable Noise Exposure for Transportation Noise Sources.	4.11-11
Table 4.11-7	Placer County Noise Ordinance Noise Level Standards for Sensitive Receptors .....	4.11-12
Table 4.11-8	Allowable Noise Levels within Specified Zone Districts .....	4.11-15
Table 4.11-9	Maximum Allowable Noise Exposure for Transportation Noise Sources .....	4.11-16
Table 4.11-10	Noise Emission Levels from Construction Equipment .....	4.11-21
Table 4.11-11	Noise Emission Levels from Construction Activities .....	4.11-22
Table 4.11-12	Summary of Modeled Substantial (5 dB or greater) Traffic Noise Level Increases from Existing to Existing Plus Project Conditions .....	4.11-37
Table 4.11-13	Significant (i.e., exceed 60 dBA $L_{dn}$ /CNEL) Increases in Traffic Noise Associated with New or Extended Roads.....	4.11-39
Table 4.11-14	Summary of Modeled Substantial (5 dB or greater) Traffic Noise Level Increases from Existing to Existing Plus PRSP Conditions.....	4.11-41
Table 4.11-15	Distance from Roadway Centerline to Relevant Noise Contours .....	4.11-44

Table 4.12-1	Sacramento—Roseville—Arden-Arcade Metropolitan Statistical Area Population Data ....	4.12-2
Table 4.12-2	Area Population Data .....	4.12-2
Table 4.12-3	SACOG Regional Growth Forecast.....	4.12-3
Table 4.12-4	Placer County and City Population Data .....	4.12-3
Table 4.12-5	Placer County Employment Data.....	4.12-4
Table 4.12-6	Placer County Employment and Housing Characteristics 2017 .....	4.12-4
Table 4.12-7	Project Housing, Population, and Employment at Buildout.....	4.12-10
Table 4.13-1	Public Service Providers.....	4.13-2
Table 4.13-2	Response Times .....	4.13-5
Table 4.13-3	Public Schools That Serve the Project Area.....	4.13-7
Table 4.13-4	Development and Resident Assumptions for the SAP and PRSP .....	4.13-20
Table 4.13-5	Demand for Firefighters and Support/Planning Staff in the Net SAP Area and PRSP Area .....	4.13-24
Table 4.13-6	Demand for Placer County Sheriff Officers in the Net SAP Area and PRSP Area .....	4.13-28
Table 4.13-7	Net SAP Area Student Generation Estimates .....	4.13-31
Table 4.13-8	PRSP Student Generation Estimates .....	4.13-32
Table 4.13-9	Summary of Parks and Open Space Requirements for Net SAP Area .....	4.13-35
Table 4.13-10	Summary of Parks and Open Space Requirements and Credits for PRSP Area .....	4.13-36
Table 4.14-1	Roadway Segment Level of Service Thresholds – Placer County .....	4.14-8
Table 4.14-2	Levels of Service Definitions – Signalized Intersections .....	4.14-9
Table 4.14-3	Levels of Service Definitions – Unsignalized Intersections .....	4.14-10
Table 4.14-4	Freeway Level of Service Definitions.....	4.14-10
Table 4.14-5	Placer County Roadway Level of Service – Existing Conditions .....	4.14-11
Table 4.14-6	Intersection Operations – Placer County – Existing Conditions .....	4.14-11
Table 4.14-7	Signalized Intersection Operations – City of Roseville – Existing Conditions.....	4.14-12
Table 4.14-8	Unsignalized Intersection Operations – City of Roseville– Existing Conditions .....	4.14-13
Table 4.14-9	Intersection Operations – City of Rocklin – Existing Conditions .....	4.14-14
Table 4.14-10	Intersection Operations – City of Lincoln – Existing Conditions.....	4.14-15
Table 4.14-11	Intersection Operations – Sutter County– Existing Conditions .....	4.14-15
Table 4.14-12	Intersection Operations – Sacramento County– Existing Conditions .....	4.14-16
Table 4.14-13	Intersection Operations – Caltrans – Existing Conditions .....	4.14-17
Table 4.14-14	Freeway Operations – Existing Conditions.....	4.14-18
Table 4.14-15	Peak Hour Freeway Off-Ramp Queuing – Existing Conditions.....	4.14-21
Table 4.14-16	Sunset Area & West Placer VMT per Service Population – Existing Conditions.....	4.14-22
Table 4.14-17	Net Sunset Area Plan Land Use Summary .....	4.14-34
Table 4.14-18	Proposed Project Land Use Summary1 .....	4.14-35
Table 4.14-19	Placer Ranch Specific Plan Trip Generation .....	4.14-42
Table 4.14-20	Placer County Roadway Level of Service – Existing Plus Project Conditions .....	4.14-48

Table 4.14-21	Intersection Operations – Placer County – Existing Plus Project Conditions .....	4.14-52
Table 4.14-22	Signalized Intersection Operations – City of Roseville – Existing Plus SAP Buildout Conditions .....	4.14-60
Table 4.14-23	Signalized Intersection Operations – City of Roseville – Existing Plus Placer Ranch Specific Plan Conditions .....	4.14-61
Table 4.14-24	Unsignalized Intersection Operations – City of Roseville – Existing Plus Project Conditions .....	4.14-69
Table 4.14-25	Intersection Operations – City of Rocklin – Existing Plus Project Conditions.....	4.14-72
Table 4.14-26	Intersection Operations – City of Lincoln – Existing Plus Project Conditions .....	4.14-74
Table 4.14-27	Intersection Operations – Sutter County – Existing Plus Project Conditions.....	4.14-77
Table 4.14-28	Intersection Operations – Sacramento County – Existing Plus Project Conditions .....	4.14-78
Table 4.14-29	Intersection Operations – Caltrans – Existing Plus Project Conditions .....	4.14-79
Table 4.14-30	Freeway Operations – Existing Plus Project Conditions.....	4.14-83
Table 4.14-31	Peak Hour Freeway Off-Ramp Queuing – Existing Plus Project Conditions.....	4.14-87
Table 4.14-32	Project Generated VMT – Existing Plus Sunset Area Plan Buildout Conditions .....	4.14-88
Table 4.14-33	Project Generated VMT – Existing Plus Placer Ranch Specific Plan Conditions .....	4.14-89
Table 4.14-34	Sunset Area Plan 20-Year Project Land Use Summary.....	4.14-102
Table 4.14-35	Trip Generation – Cumulative Plus Sunset Area Plan Scenarios .....	4.14-106
Table 4.14-36	Placer County Roadway Level of Service – Cumulative (2036) Conditions.....	4.14-110
Table 4.14-37	Intersection Operations – Placer County – Cumulative (2036) Conditions .....	4.14-116
Table 4.14-38	Signalized Intersection Operations – City of Roseville – Cumulative No Project (2036) Conditions .....	4.14-121
Table 4.14-39	Signalized Intersection Operations – City of Roseville – Cumulative Plus PRSP Plus SAP 20-Year Project (2036) Conditions.....	4.14-123
Table 4.14-40	Signalized Intersection Operations – City of Roseville – Cumulative Plus Placer Ranch Conditions .....	4.14-125
Table 4.14-41	Unsignalized Intersection Operations – City of Roseville – Cumulative (2036) Conditions .....	4.14-126
Table 4.14-42	Intersection Operations – City of Rocklin – Cumulative (2036) Conditions.....	4.14-130
Table 4.14-43	Intersection Operations – City of Lincoln – Cumulative (2036) Conditions .....	4.14-133
Table 4.14-44	Intersection Operations – Sutter County – Cumulative (2036) Conditions.....	4.14-135
Table 4.14-45	Intersection Operations – Sacramento County – Cumulative (2036) Conditions.....	4.14-136
Table 4.14-46	Intersection Operations – Caltrans – Cumulative (2036) Conditions.....	4.14-137
Table 4.14-47	Freeway Operations – Cumulative (2036) Conditions.....	4.14-141
Table 4.14-48	Peak Hour Freeway Off-Ramp Queuing – Cumulative (2036) Conditions .....	4.14-147
Table 4.14-49	Project Generated VMT – Cumulative Plus PRSP Plus SAP (20-Year Project) Conditions .....	4.14-148
Table 4.14-50	Project Generated VMT – Cumulative Plus Sunset Area Plan Conditions .....	4.14-149
Table 4.14-51	Project Generated VMT – Cumulative Plus Placer Ranch Specific Plan Conditions .....	4.14-149

Table 4.15-1	Utility Providers for the Project Area.....	4.15-2
Table 4.15-2	Surface Water Rights and Contract Entitlements .....	4.15-4
Table 4.15-3	Projected Average Year Water Supplies (afy) .....	4.15-5
Table 4.15-4	Existing Supplies during a Single Dry Year and Multiple Dry Years (afy) .....	4.15-6
Table 4.15-5	Average Year Supply and Demand Comparison (afy) .....	4.15-6
Table 4.15-6	Single Driest Year Supply and Demand Comparison (afy).....	4.15-7
Table 4.15-7	Multiple Dry Year Supply and Demand Comparison (afy).....	4.15-7
Table 4.15-8	Net SAP Area Water Demand .....	4.15-37
Table 4.15-9	PRSP Area Water Demand.....	4.15-38
Table 4.15-10	Net Sunset Area Plan Area Wastewater Flows .....	4.15-48
Table 4.15-11	Placer Ranch Specific Plan Area Wastewater Flows .....	4.15-49
Table 4.15-12	Estimated Waste Generated by Sunset Area Plan and Placer Ranch Specific Plan Construction.....	4.15-54
Table 4.15-13	Estimated Solid Waste Generated by Operation of the Sunset Area Plan and the Placer Ranch Specific Plan .....	4.15-56
Table 4.15-14	Summary of Buildout Average Dry Weather Flows for the SPWA Service Boundaries....	4.15-67
Table 4.16-1	Energy Consumption for Net SAP Area .....	4.16-15
Table 4.16-2	Energy Consumption for PRSP Area.....	4.16-17
Table 4.16-3	Construction Energy Consumption from Other Supporting Infrastructure.....	4.16-19
Table 5-1	Employment Growth .....	5-6
Table 6-1	Project Development at Buildout.....	6-4
Table 6-2	1997 Sunset Industrial Area Plan Development Standards .....	6-9
Table 6-3	20-Year Development Projections for 1997 SIA Plan and Proposed Project.....	6-10
Table 6-4	Development at Buildout of Alternative 3: Reduced Footprint, Reduced Development Potential .....	6-18
Table 6-5	Development at Buildout of Alternative 4: Reduced Footprint, Similar Development Potential .....	6-21
Table 6-6	Development Projections of Alternative 5: Reduced Vehicle Miles Traveled .....	6-25
Table 6-7	Summary Environmental Effects of the Alternatives Relative to the Significant Impacts of the Project.....	6-28

## LIST OF ABBREVIATIONS

$\mu\text{g}/\text{m}^3$	micrograms per cubic meter
AB	Assembly bill
ADR	advanced dry recovery
AFV	alternative fuel vehicle
afy	acre-feet per year
ALS	amyotrophic lateral sclerosis
AMR	American Medical Response
ARA	Aggregate Resource Area
ARB	California Air Resources Board
AVR	average vehicle ridership
BA	Biological Assessment
BACT	Best Available Control Technology
Basin Plan	<i>Water Quality Control Plan for the Sacramento River and San Joaquin River Basins</i>
BIOS	Biogeographic Information and Observation System
BMP	best management practice
B.P.	Before Present
BPK	Business Park
BRT	bus rapid transit
Btu	British thermal unit(s)
CAA	federal Clean Air Act
CAAA	federal Clean Air Act Amendments of 1990
CAAQS	California Ambient Air Quality Standards
CAFE	Corporate Average Fuel Economy
CalARP	California Accidental Release Prevention
CalEEMod	California Emissions Estimator Model
Cal EPA	California Environmental Protection Agency
CAL FIRE	California Department of Forestry and Fire Protection
Cal OES	California Governor's Office of Emergency Services
Cal/OSHA	California Occupational Safety and Health Administration
Cal Recycle	California Department of Resources Recycling and Recovery
Caltrans	California Department of Transportation
CAP	Climate Action Plan
CAPCOA	California Air Pollution Control Officers Association

CARB	California Air Resources Board
CARP	County Aquatic Resources Program
CBC	California Building Code
CCAA	California Clean Air Act
CCR	California Code of Regulations
CCRR	California Central Railroad
CDFW	California Department of Fish and Wildlife
CEC	California Energy Commission
CESA	California Endangered Species Act
CEQA	California Environmental Quality Act
CERCLA	Comprehensive Environmental Response, Compensation, and Liability Act of 1980
CFD	Placer County Community Facilities District
CFR	Code of Federal Regulations
cfs	cubic feet per second
CGS	California Geological Survey
CHP	California Highway Patrol
CHWMP	Placer County Hazardous Waste Management Plan
CH <sub>4</sub>	methane
CIP	Capital Improvement Plan
cm	centimeter(s)
CMP	congestion management program
CMU	Commercial Mixed Use
CNDDB	California Natural Diversity Database
CNPS	California Native Plant Society
CNRA	California Natural Resources Agency
County	Placer County
CO	carbon monoxide
CO <sub>2</sub>	carbon dioxide
CO <sub>2e</sub>	carbon dioxide equivalent
CP	Campus Park
CPD	Commercial Planned Development
CPUC	California Public Utilities Commission
CRHR	California Register of Historical Resources
CRPR	California Rare Plant Rank
CSU	California State University system
CUPA	Certified Unified Program Agency
CVRWQCB	Central Valley Regional Water Quality Control Board
CWA	Clean Water Act
CWHR	California wildlife habitat relationship
CWPP	Community Wildfire Protection Plan

dbh	diameter at breast height
DCP	dust control plan
DCWWTP	Dry Creek Wastewater Treatment Plant
Delta	Sacramento–San Joaquin Delta
DFG	California Department of Fish and Game
DG	decomposed granite
DO	dissolved oxygen
DOC	California Department of Conservation
DOT	U.S. Department of Transportation
DPR	California Department of Parks and Recreation
DRC	Placer County Development Review Committee
DTSC	California Department of Toxic Substances Control
du	dwelling unit
du/ac	dwelling units per acre
EAP	Energy Action Plan
EI	Eco-Industrial
EIA	U.S. Energy Information Administration
EIR	environmental impact report
EMF	electromagnetic field
EMU	Entertainment Mixed-Use
EO	executive order
EPA	U.S. Environmental Protection Agency
EPAct	Energy Policy Act of 1992
EPCRA	Emergency Planning and Community Right-to-Know Act of 1986
EPIC	Environmental Planning and Information Council
ESA	Federal Endangered Species Act
ESD	Engineering and Surveying Division
ET	evapotranspiration
FAR	floor area ratio
FEMA	Federal Emergency Management Agency
FHWA	Federal Highway Administration
FMMP	Farmland Mapping and Monitoring Program
gal	gallon(s)
GC	General Commercial
GHG	greenhouse gas

HAP	hazardous air pollutant
HCD	California Department of Housing and Community Development
HCP	habitat conservation plan
HDR	High Density Residential
HRA	health risk assessment
HWCL	Hazardous Waste Control Law
I-	interstate
IBC	International Building Code
IC	Innovation Center
IEPR	Integrated Energy Policy Report
IPaC	Information for Planning and Consultation
ISO	Insurance Services Office
kBtu	thousand British thermal units
ksf	thousand square feet
kV	kilovolt(s)
kWh	kilowatt-hour(s)
LAFCO	local agency formation commission
lb/day	pounds per day
LCFS	Low Carbon Fuel Standard
LDR	Low Density Residential
LDR-A	Low Density Residential—Age-Restricted
LEA	Local Enforcement Agency
LEDPA	least environmentally damaging practicable alternative
LEED	Leadership in Energy and Environmental Design
LHMP	local hazard mitigation plan
LI	Light Industrial
LID	low-impact development
LOS	level of service
LRA	local responsibility area
LRR	Information for Planning and Consultation
LTMP	long term management plan
MCFH	thousand cubic feet per hour
MCL	maximum contaminant level
MDR	Medium Density Residential
mgd	million gallons per day
MLD	most likely descendant

MMP	mitigation and monitoring plan
MMRP	mitigation monitoring and reporting plan
MMT	million metric ton(s)
mph	miles per hour
MPO	metropolitan planning organization
MRF	materials recovery facility
MRZ	Mineral Resource Zone
MSA	metropolitan statistical area
msl	mean sea level
MSW	municipal solid waste
MT	metric ton(s)
MTP	metropolitan transportation plan
MTP/SCS	Metropolitan Transportation Plan/Sustainable Communities Strategy
MVA	megavolt amperes
MWELo	Model Water Efficient Landscape Ordinance
NAAQS	National Ambient Air Quality Standards
NAHC	Native American Heritage Commission
NCCP	natural community conservation plan
NCCP Act	California Natural Community and Conservation Planning Act
NCIC	North Central Information Center
NEPA	National Environmental Policy Act
NHTSA	National Highway Traffic Safety Administration
NOAA	National Oceanic and Atmospheric Administration
NO	nitric oxide
NOP	notice of preparation
NO <sub>x</sub>	oxides of nitrogen
NO <sub>2</sub>	nitrogen dioxide
NPDES	National Pollutant Discharge Elimination System
NRCS	Natural Resources Conservation Service
NRHP	National Register of Historic Places
N <sub>2</sub> O	nitrous oxide
OPR	Governor's Office of Planning and Research
OS	Open Space
OSHA	Occupational Safety and Health Administration
PCAPCD	Placer County Air Pollution Control District
PCAPCQMD	Placer County Air Quality Management Pollution Control District
PCB	polychlorinated biphenyl

PCCP	Placer County Conservation Plan
PCE	Placer Commuter Express
PCEH	Placer County Environmental Health
PCFCWCD	Placer County Flood Control and Water Conservation District
PCWA	Placer County Water Agency
PD	Planned Residential Development
PF	Public Facilities
PG&E	Pacific Gas and Electric Company
PGWWTP	Pleasant Grove Wastewater Treatment Plant
PHMSA	Pipeline and Hazardous Materials Safety Administration
Placer County Fire	Placer County Fire Department
PM	particulate matter
P/MR	Preserve/Mitigation Reserve
PM <sub>2.5</sub>	fine particulate matter with aerodynamic diameter of 2.5 micrometers or less
PM <sub>10</sub>	respirable particulate matter with aerodynamic diameter of 10 micrometers or less
Porter-Cologne Act	Porter-Cologne Water Quality Control Act of 1970
ppb	parts per billion
ppm	parts per million
PR	Parks and Recreation
PRC	Public Resource Code
PRSP	Placer Ranch Specific Plan
PRV	pressure-reducing valve
PUE	public utility easement
R&D	research and development
RCP	representative concentration pathway
RCRA	Resource Conservation and Recovery Act
RCSD	Roseville City School District
Reason Farms	Reason Farms Retention Facility
RJUHSD	Roseville Joint Union High School District
RMP	risk management plan
ROG	reactive organic gases
RPS	renewable portfolio standard
RWQCB	Regional Water Quality Control Board
SACOG	Sacramento Area Council of Governments
Sac State	California State University, Sacramento
SAF Plan	State Alternative Fuels Plan
SANDAG	San Diego Association of Governments
SAP	Sunset Area Plan

SARA	Superfund Amendments and Reauthorization Act
SB	Senate bill
SCAQMD	South Coast Air Quality Management District
SCS	sustainable communities strategy
s.f.	square feet
SGMA	Sustainable Groundwater Management Act of 2014
SIA	Sunset Industrial Area
SIP	state implementation plan
SJVAPCD	San Joaquin Valley Air Pollution Control District
SMARA	Surface Mining and Reclamation Act of 1975
SMUD	Sacramento Municipal Utility District
SO <sub>2</sub>	sulfur dioxide
SPCC	Spill Prevention, Control, and Countermeasure
SPL	Specific Plan
SPMA	South Placer Market Area
SPRTA	South Placer Regional Transportation Authority
SPWA	South Placer Wastewater Authority
SWPPP	storm water pollution prevention plan
SWQP	stormwater quality plan
SWRCB	State Water Resources Control Board
SR	state route
SRA	State Responsibility Area
S-SV EMS	Sierra-Sacramento Valley Emergency Medical Services Agency
STP	shovel test probe
SUD	Special Use District
Sunset Area	Sunset Area Plan area
SVAB	Sacramento Valley Air Basin
SWPPP	storm water pollution prevention plan
SWRCB	State Water Resources Control Board
TAC	toxic air contaminant
TCM	transportation control measure
TCR	tribal cultural resource
TPD	ton(s) per day
TRU	transport refrigeration unit
UAIC	United Auburn Indian Community
UDA	urban decay analysis
UFC	Uniform Fire Code
Unified Program	Unified Hazardous Waste and Hazardous Materials Management Regulatory Program

UPRR	Union Pacific Railroad
UR	Urban Reserve
USACE	U.S. Army Corps of Engineers
UCMP	University of California Museum of Paleontology
USC	United States Code
USDA	U.S. Department of Agriculture
USFWS	U.S. Fish and Wildlife Service
USGS	U.S. Geological Survey
UTC	University Town Center
UZ	University
VHFHSZ	Very High Fire Hazard Severity Zone
VMT	vehicle miles traveled
VOC	volatile organic compound
VPC	Vernal pool Complex
WNV	West Nile virus
WPCGMP	<i>Western Placer County Groundwater Management Plan</i>
WPSWQDM	<i>West Placer Storm Water Quality Design Manual</i>
WPUSD	Western Placer Unified School District
WPWMA	Western Placer Waste Management Authority
WRSL	Western Regional Sanitary Landfill
WUI	wildland urban interface
WWTP	wastewater treatment plant
WWTRF	City of Lincoln Wastewater Treatment and Reclamation Facility
ZNE	zero net energy