SUTTER POINTE REGIONAL WASTEWATER CONVEYANCE PROJECT

Draft Environmental Impact Report

Prepared for
Sutter County

August 2016

ESA

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Acronyms and Abbreviations

°F	degrees Fahrenheit
µg/m^3	micrograms per cubic meter
2013 SIP Revisions	*Sacramento Regional 8-Hour Ozone Attainment and Reasonable Further Progress Plan*
AB	Assembly Bill
ADWF	Average Dry Weather Flow
Agreement	Wastewater Service by Contract and Operating Agreement by and between Sutter County, Regional San and SASD
APCO	air pollution control officer
APS	alternative planning strategy
AQAP	Air Quality Attainment Plan
BACT	best available control technology
basin plans	water quality control plans
Blvd.	Boulevard
BMP	Best Management Practice
BMP Standards	Best Management Practices standards of the California Stormwater Quality Association
BP	Before Present
Cal/EPA	California Environmental Protection Agency
California Register	California Register of Historical Resources
Caltrans	California Department of Transportation
CAPCOA	California Air Pollution Control Officers Association
CARB	California Air Resources Board
CCAA	California Clean Air Act
CCR	California Code of Regulations
CDFW	California Department of Fish and Wildlife
CEC	California Energy Commission
CEQA	California Environmental Quality Act
CFR	Code of Federal Regulations
CO	carbon monoxide
CO_2	carbon dioxide
CO_2e	carbon dioxide equivalents
County	Sutter County
CSA	County Service Area
CSD	Community Services District
CVRWQCB	Central Valley Regional Water Quality Control Board
CWA	federal Clean Water Act
cy	cubic yard
dB	decibels

dBA	A-weighted decibels
Delta	Sacramento–San Joaquin Delta
DCWWTP	Dry Creek wastewater treatment plant
EIR	Environmental Impact Report
ESD	equivalent single family dwelling
FCAA	federal Clean Air Act
FHWA	Federal Highway Administration
FIP	federal Implementation Plan
FRAQMD	Feather River Air Quality Management District
FY	fiscal year
GHG	greenhouse gas
GIS	geographic information system
gpd	gallons per day
GVW	gross vehicle weight
HCP	Habitat Conservation Plan
HDD	horizontal directional drilling
hp	horse power
HPD	Historic Properties Directory
I-5	Interstate 5
I-80	Interstate 80
ITP	incidental take permit
kW	kilowatt
L_{10}	noise level that equals or exceeds 10 percent of the specified time period
L_{50}	median noise level
L_{90}	noise level that equals or exceeds 90 percent of the specified time period
L_{dn}	24-hour day and night A-weighted noise exposure level
L_{eq}	equivalent sound level
L_{max}	instantaneous maximum noise level for a specified period of time
LVW	loaded vehicle weight
mgd	million gallons per day
MLD	Most Likely Descendant
MMRP	Mitigation Monitoring and Reporting Program
mph	miles per hour
MPO	metropolitan planning organization
NAAQS	National Ambient Air Quality Standards
NBC	Natomas Basin Conservancy
NBHCP	Natomas Basin Habitat Conservation Plan
NCIC	North Central Information Center
NEIC	Northeast Information Center
NLIP	Natomas Levee Improvement Program

NNCP	North Natomas Community Plan
NNPMP	Natomas North Precinct Master Plan
NO	nitric oxide
NOI	Notice of Intent
NOP	Notice of Preparation
NO_2	nitrogen dioxide
NOx	nitrogen oxides
NPDES	National Pollutant Discharge Elimination System
NWIC	Northwest Information Center
OAP	Ozone Attainment Plan
O&M	operation and maintenance
OHP	Office of Historic Preservation
OPR	Governor's Office of Planning and Research
Panhandle Project	Panhandle Annexation and Planned Unit Development
PCAPCD	Placer County Air Pollution Control District
PD	Planned Development
PERP	Portable Equipment Registration Program
PG&E	Pacific Gas and Electric Company
PGCC	Pleasant Grove Creek Canal
PGWWTP	Pleasant Grove wastewater treatment plant
$PM_{2.5}$	particulate matter that is 2.5 microns or less in diameter
PM_{10}	particulate matter
ppd	pounds per day
ppm	parts per million
PPV	peak particle velocity
PRC	Public Resources Code
proposed project	Sutter Pointe Regional Wastewater Conveyance project
PUD	Planned Unit Development
PWWF	Peak Wet Weather Flow
Rd.	Road
RD	Reclamation District
Regional San	Sacramento Regional County Sanitation District
Reporting Rule	Greenhouse Gas Reporting Rule
ROG	reactive organic gas
rpm	revolutions per minute
RWQCB	Regional Water Quality Board
SAFCA	Sacramento Area Flood Control Agency
SASD	Sacramento Area Sewer District
SB	Senate Bill
SCS	sustainable communities strategy

SFNA	Sacramento Federal Ozone Nonattainment Area
SHPO	State Historic Preservation Officer
SIP	State Implementation Plan
SLM	sound level meter
SMAQMD	Sacramento Metropolitan Air Quality Management District
SO_2	sulfur dioxide
SPWA	South Placer Wastewater Authority
SPSP	Sutter Pointe Specific Plan
SR	State Route
SRFCP	Sacramento River Flood Control Project
SRWTP	Sacramento Regional Wastewater Treatment Plant
SSO	Sewer System Overflow
SVAB	Sacramento Valley Air Basin
TNW	traditional navigable waters
tpy	tons per year
UNWI	Upper Northwest Interceptor
UPA	Urban Policy Area
USACE	United States Army Corps of Engineers
USB	Urban Services Boundary
U.S. EPA	U.S. Environmental Protection Agency
VdB	vibration decibels
VMT	vehicle miles traveled
VOC	volatile organic compound
W.	west

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EXECUTIVE SUMMARY

Introduction

Pursuant to the California Environmental Quality Act (CEQA), Sutter County as the CEQA Lead Agency has prepared this Focused Tiered Environmental Impact Report (EIR) for the Sutter Pointe Regional Wastewater Conveyance project (proposed project). The proposed project would extend wastewater service from the Upper Northwest Interceptor (UNWI), operated by the Sacramento Regional County Sanitation District (Regional San), to the Sutter Pointe Specific Plan (SPSP) area. Wastewater service to the SPSP area would be provided by the Regional San and the Sacramento Area Sewer District (SASD) under a Wastewater Service by Contract and Operating Agreement by and between Sutter County, Regional San and SASD (Agreement). The proposed project would include on- and off-site facilities needed to convey future wastewater flows from the SPSP area to the UNWI; including pumping facilities and parallel force mains, for conveyance to the Sacramento Regional Wastewater Treatment Plant (SRWTP) for treatment. The proposed parallel force mains would extend from the SPSP area to a point of connection with the UNWI near the intersection of West 6th Street and Elkhorn Boulevard in Rio Linda, an unincorporated community in Sacramento County. SASD would provide wastewater system operation and maintenance services to the SPSP area. However, Sutter County or other party of interest could assume these duties in the future.

In November of 2004, Sutter County voters approved Measure M, an advisory measure to give the Board of Supervisors direction for the planning of growth on approximately 7,500 acres known as the SPSP area. Measure M identified the development of a mix of land uses, including industry, commerce, education, housing, recreation, and open space and would be integrated within the Natomas Basin Habitat Conservation Plan (NBHCP). An EIR for the SPSP (SCH # 2007032157) was certified by the Sutter County Board of Supervisors on June 30, 2009. The SPSP EIR included a programmatic assessment of development of the entire SPSP area and a project-level analysis for the first phase of development.

The SPSP area is not currently served by any municipal wastewater collection and treatment system. Existing residential, industrial and commercial uses within the area are served by individual on-site septic tank systems. A Sewer Master Plan was developed (2008 Sewer Master Plan) that estimated wastewater demand from development of the SPSP and presented various options for providing wastewater service to the SPSP area. It also identified on- and off-site infrastructure needs for the options. The 2008 Sewer Master Plan: (1) concluded that the

preferred options would be to extend service from the Regional San system; (2) confirmed the ability of the County to connect the Regional San system; and (3) confirmed the ability of Regional San to accept wastewater flows from the full buildout of the SPSP area. Over time, as the SPSP is built out, the 2008 Master Plan will need to be updated and future master plans will need to include additional detail on both on- and off-site infrastructure including: (1) on-site pump stations, force mains, trunk lines and major collectors; (2) facility phasing; and (3) collector and lateral systems to serve individual lots. The 2009 SPSP EIR evaluated the impacts on the environment from construction of on- and off-site wastewater conveyance infrastructure of extending service from the Regional San system to serve the SPSP presented in the 2008 Sewer Master Plan. In accordance with CEQA Guidelines Section 15152, this EIR is tiered from the 2009 SPSP EIR. This Focused Tiered EIR was prepared by the County to address the environmental impacts associated with the construction and operation of new wastewater conveyance infrastructure to support development of the SPSP area.

In 2015, the proposed project was developed to provide more detailed information about the on- and off-site infrastructure needed to serve Phase I of the SPSP and additional information on future off-site facilities that would be needed to convey future flows from the SPSP area to the UNWI. The proposed project wastewater conveyance facilities are described in more detail in Chapter 2, Project Description.

Mitigation measures adopted by the County for the SPSP included developing and executing an agreement-in-principal, a wastewater services agreement, an operations agreement, and paying connection and capacity fees to the Regional San through these agreements. In 2009, the County and Regional San entered into an agreement-in-principal (Principles of Agreement) to convey wastewater flows generated within the SPSP area to the UNWI for treatment at the SRWTP and discharge to the Sacramento River. The Principles of Agreement set forth the basic terms and conditions under which Regional San would extend service to the SPSP area. It also established the framework for a future service agreement which is the Wastewater Service by Contract and Operating Agreement. The Agreement is described in more detail in Chapter 2, Project Description. This Focused Tiered EIR has been prepared to provide an assessment of the potential environmental consequences of constructing and operating the infrastructure to provide wastewater conveyance to the SPSP area.

Project Description

As previously stated, the proposed project would extend sewer service from the UNWI, operated by Regional San, to the SPSP. Wastewater service to the SPSP would be provided by the Regional San and the SASD under a Wastewater Service by Contract and Operating Agreement (Agreement) by and between Sutter County, Regional San and SASD. The Agreement is a three-party contract between Regional San, SASD, and the County to extend wastewater services to the SPSP area. The Agreement describes the terms and conditions under which these three agencies would divide the responsibilities, duties and obligations to provide wastewater service to the

SPSP. Specifically, the Agreement addresses the legal, operational and administrative details of providing wastewater service to the SPSP area. No physical facilities are proposed as part of the Agreement; physical facilities are identified as part of the proposed project, as described below. Under the terms of the Agreement, the County, through a yet to be formed independent special district, would be responsible to collect wastewater flows generated from development in the SPSP area. The wastewater flows would be conveyed to the UNWI with the Regional San adjusting its operational strategy to divert flows at the UNWI 4/5 junction and reduce pumping at the New Natomas Pump Station to maintain sufficient capacity for flows from the SPSP. Regional San would then convey the SPSP flows, along with the flows from its Contributing Members and Contracting Agencies,[1] to the SRWTP for treatment. After treatment, SPSP flows are discharged into the Sacramento River just downstream of the Freeport Bridge.

The proposed project would include the construction of pumping facilities and parallel force mains from the SPSP to a point of connection with the UNWI in Rio Linda, an unincorporated community in Sacramento County. SASD would provide wastewater system operation and maintenance services to the SPSP area. However, Sutter County or a future municipality could assume these duties in the future SASD would provide sewer system operation and maintenance services to Sutter County until such time as the County assumes those duties and/or the SPSP is annexed to Regional San and SASD.

Construction of proposed project facilities would be phased. Two initial pumping stations and one of two planned force mains that would connect the SPSP to the UNWI would be installed and operated first. These initial facilities are being evaluated at a project level in this Focused Tiered EIR. A future regional pump station and the remaining two force mains would be installed and operated at a later date and are evaluated at a program level in this Focused Tiered EIR.

Project Location

The proposed project would initiate within the SPSP area. The SPSP area encompasses approximately 7,528 acres in south Sutter County, immediately north of the Sutter/Sacramento County line. The SPSP area is located approximately 12 miles north of downtown Sacramento and two miles northeast of Sacramento International Airport. The Sacramento River is situated about one mile west of the SPSP area (**Figure 2-1**). The SPSP area is generally bounded by Natomas Road (Rd.) on the east and Powerline Rd. on the west. The northern boundary is approximately four miles north of the Sutter County line. State Route (SR) 99/70 divides the southern portion of the SPSP area and serves as the western boundary of the northern portion of the SPSP. The proposed project would include the construction of pump stations and force mains from the SPSP to a point of connection with the UNWI near the intersection of West (W.) 6th Street and Elkhorn Boulevard (Blvd.) in Rio Linda, an unincorporated community in Sacramento County. The proposed force main route from the SPSP area would be approximately seven miles

[1] Regional San provides service to the cities of Sacramento, West Sacramento, Citrus Heights, Elk Grove, Folsom, and Rancho Cordova; unincorporated Sacramento County; and the communities of Courtland and Walnut Grove. Contracting agencies include SASD and the cities of Folsom, Sacramento and West Sacramento.

in length. The force main route would be approximately 8.5 miles (44,825 feet) and begin at the connection with the UNWI at W. Elkhorn Blvd. to W. 6th Street, then along W. M Street, W. 2nd Street, Elwyn Avenue, Rio Linda Boulevard, Pleasant Grove Rd., and W. Riego Rd., where it would enter the SPSP area connecting with the proposed pump stations located in Zone 1 and Zone 2 (described below) as shown in **Figure 2-2**.

Project Objectives

The CEQA Guidelines (Section 15124) state that project objectives should be a statement of the objectives that will help develop a reasonable range of alternatives and aid decision makers in preparing findings and overrides. It should also include the underlying purpose of the project. Therefore, the project objectives need to be specific enough to capture the intent of the project and to guide the development of alternatives such that they also capture the intent of the project. The objectives of the proposed project are to:

- provide adequate wastewater conveyance, treatment and discharge to support buildout of the SPSP area in compliance with the SPSP and Sewer Master Plan;
- not adversely affect the conveyance or treatment capacity of existing facilities; and,
- comply with the Natomas Basin Habitat Conservation Plan, Sacramento Area Flood Control Agency flood control plans, and other regional resource conservation and land use plans.

Areas of Controversy

In accordance with Sections 15063 and 15082 of the CEQA Guidelines, the County prepared a Notice of Preparation (NOP) for this Focused Tiered EIR and published it on January 22, 2016 (see Appendix A). The NOP was circulated to the public, local, state and federal agencies, and other interested parties to solicit comments on the proposed project for a 30-day public and agency comment period. Concerns that were raised in response to the NOP were considered during preparation of this Focused Tiered EIR as summarized below:

- Coordination with other local construction projects along the pipeline alignment,
- Evaluation of growth inducement,
- Analysis of construction and operational air quality emissions,
- Analysis of effects on water quality,
- Encroachment permitting from the Central Valley Flood Protection Board, and
- Construction within Sacramento Municipal Utility District's transmission line easements.

Significant and Unavoidable Environmental Effects

The proposed project would have no significant and unavoidable environmental effects.

Alternatives to the Proposed Project

This Focused Tiered EIR considered two alternatives that were previously proposed by the 2008 Sewer Master Plan, including on-site wastewater treatment and wastewater conveyance to wastewater treatment plants in western Placer County. These alternatives were found to have significant permitting and environmental impacts compared to the proposed project and would, therefore, not meet the CEQA requirements of avoiding or substantially lessening the impacts of the proposed project. The only alternative evaluated in this Focused Tiered EIR is the No Project Alternative. Under the No Project Alternative, wastewater service would not be extended from the UNWI for treatment and disposal at the SRWTP. Wastewater service to the SPSP area would not be provided by Regional San and SASD under a Wastewater Service by Contract and Operating Agreement by and between Sutter County, Regional San and SASD. None of the proposed on- and off-site facilities would be constructed or operated. An option under the No Project Alternative could be to install and operate individual septic systems; however, this would likely not be technically feasible (not provide adequate treatment or treatment capacity) and would result in new and additional impacts when compared to the proposed project including, but not limited to, groundwater quality, biological resources, and land use consistency.

The No Project Alternative would not achieve any of the proposed project objectives. It would: (1) not provide adequate wastewater conveyance, treatment and discharge to support buildout of the SPSP area in compliance with the SPSP and Sewer Master Plan; (2) it could adversely affect the conveyance or treatment capacity of existing facilities; and, (3) it might not comply with the Natomas Basin Habitat Conservation Plan, Sacramento Area Flood Control Agency flood control plans, and other regional resource conservation and land use plans.

Summary Table

Table ES-1 (Summary of Impacts and Mitigation Measures), has been organized to correspond with the environmental issues discussed in Chapter 3 of this Focused Tiered EIR. The summary table is arranged in four columns:

1. Environmental impacts (“Impact”).
2. Level of significance without mitigation (“Significance Before Mitigation”).
3. Mitigation measures (“Mitigation Measure”).
4. The level of significance after implementation of mitigation measures (“Significance After Mitigation”).

If an impact is determined to be significant or potentially significant, mitigation measures are identified, where appropriate and feasible. More than one mitigation measure may be required to reduce the impact to a less-than-significant level. This Focused Tiered EIR assumes that all applicable plans, policies, and regulations would be implemented, including, but not necessarily limited to, County General Plan policies, laws, and requirements or recommendations of Placer

County. Applicable plans, policies, and regulations are identified and described in the Regulatory Setting of each issue area and within the relevant impact analysis. A description of the organization of the environmental analysis, as well as key foundational assumptions regarding the approach to the analysis, is provided in Section 3.1, Introduction to the Analysis.

TABLE ES-1.
SUMMARY OF IMPACTS AND MITIGATION MEASURES

Impact	Significance Before Mitigation: Initial	Significance Before Mitigation: Future	Mitigation Measure	Significance After Mitigation: Initial	Significance After Mitigation: Future
3.2 Air Quality					
3.2-1: Proposed project construction activities would generate temporary, short-term emissions of NO_x that could exceed FRAQMD, PCAPCD or SMAQMD-recommended thresholds.	S	S	3.2-1 Implement Mitigation Measure 3.4-1 on pages 3.4-28 through 3.4-30 of the 2009 SPSP EIR Specific to Sutter County for all phases of construction). The project applicant(s) of all project phases shall require their construction contractors, at the time construction is performed, to implement those construction mitigation measures that are required by the [FRAQMD]. For all construction activity on the project site, the project applicant(s) shall require construction contractors to implement both FRAQMD's Standard Mitigation Measures and Best Available Mitigation Measures for Construction Activity to reduce emissions to the maximum extent feasible for all construction activity performed in Sutter County. For all construction activity that would occur in another air district (i.e., outside of Sutter County), such as the installation of the sewer force main connection to SRCSD and other off-site improvements, the project applicant(s) shall require construction contractors to comply with the best management practices and construction emission reduction measures required by the respective local air district. No project-related construction activity shall occur until an emissions reduction plan developed by the contractor(s) is reviewed and approved in writing by Sutter County in consultation with the respective air district (i.e., FRAQMD, PCAPCD, or SMAQMD), or, where air district approval is required by law, with the approval of the air district. The following list presents all of the FRAQMD-required measures. (Both PCAPCD and SMAQMD require similar measures.) 1. The applicant shall implement FRAQMD's Fugitive Dust Control Plan with the following mitigation measures: • All grading operations on a project shall be suspended when winds exceed 20 miles per hour (mph) or when winds carry dust beyond the property line despite implementation of all feasible dust control measures. • Construction sites shall be watered as directed by the FRAQMD and as necessary to prevent fugitive dust violations. • An operational water truck shall be on-site at all times. Water shall be applied to control dust as needed to prevent visible emissions violations and off-site dust impacts. • On-site dirt piles or other stockpiled particulate matter shall be covered, wind breaks installed, and water and/or soil stabilizers employed to reduce windblown dust emissions. The use of approved nontoxic soil stabilizers shall be incorporated according to manufacturers' specifications to all inactive construction areas. • All transfer processes involving a free fall of soil or other particulate matter shall be operated in such a manner as to minimize the free fall distance and fugitive dust emissions.	LS	LS

LS = less than significant; NA = not applicable; S = significant

TABLE ES-1.
SUMMARY OF IMPACTS AND MITIGATION MEASURES

Impact	Significance Before Mitigation: Initial	Significance Before Mitigation: Future	Mitigation Measure	Significance After Mitigation: Initial	Significance After Mitigation: Future
3.2 Air Quality (cont.)					
3.2-1 (cont.)			• Approved chemical soil stabilizers shall be applied according to the manufacturers' specifications to all inactive construction areas (previously graded areas that remain inactive for 96 hours), including unpaved roads and employee/equipment parking areas. • To prevent track-out, wheel washers shall be installed where project vehicles and/or equipment exit onto paved streets from unpaved roads. Vehicles and/or equipment shall be washed before each trip. Alternatively, a gravel bed may be installed as appropriate at vehicle/equipment site exit points to effectively remove soil buildup on tires and tracks and prevent/diminish track-out. • Paved streets shall be swept frequently (water sweeper with reclaimed water recommended; wet broom permitted) if soil material has been carried onto adjacent paved, public thoroughfares from the project site. • Temporary traffic control shall be provided as needed during all phases of construction to improve traffic flow, as deemed appropriate by the appropriate department of public works and/or California Department of Transportation (Caltrans), and to reduce vehicle dust emissions. An effective measure is to enforce vehicle traffic speeds at or below 15 mph. • Traffic speeds on all unpaved surfaces shall be reduced to 15 mph or less, and unnecessary vehicle traffic shall be reduced by restricting access. Appropriate training to truck and equipment drivers, on-site enforcement, and signage shall be provided. • Ground cover shall be reestablished on the construction site as soon as possible and before final occupancy through seeding and watering. • Open burning shall be prohibited at the project site. No open burning of vegetative waste (natural plant growth wastes) or other legal or illegal burn materials (e.g., trash, demolition debris) may be conducted at the project site. Vegetative wastes shall be chipped or delivered to waste-to-energy facilities (permitted biomass facilities), mulched, composted, or used for firewood. It is unlawful to haul waste materials off-site for disposal by open burning. 2. Construction equipment exhaust emissions shall not exceed FRAQMD Regulation III, Rule 3.0, Visible Emissions Limitations (40% opacity or Ringelmann 2.0). Operators of vehicles and equipment found to exceed opacity limits shall take action to repair the equipment within 72 hours or remove the equipment from service. Failure to comply may result in a notice of violation from FRAQMD. 3. The primary contractor shall be responsible for ensuring that all construction equipment is properly tuned and maintained before and for the duration of on-site operation. 4. Idling time shall be minimized to 5 minutes in accordance with CARB airborne air toxic control measure 13 (CCR Chapter 10 Section 2485) unless more time is required per engine manufacturers' specifications or for safety reasons.		

LS = less than significant; NA = not applicable; S = significant

TABLE ES-1.
SUMMARY OF IMPACTS AND MITIGATION MEASURES

Impact	Significance Before Mitigation: Initial	Significance Before Mitigation: Future	Mitigation Measure	Significance After Mitigation: Initial	Significance After Mitigation: Future
3.2 Air Quality (cont.)					
3.2-1 (cont.)			5. Existing power sources (e.g., power poles) or clean-fuel generators shall be used rather than temporary power generators. 6. A traffic plan shall be developed to minimize traffic flow interference from construction activities. The plan may include advance public notice of routing, use of public transportation, and satellite parking areas with a shuttle service. Operations that affect traffic shall be scheduled for off-peak hours. Obstruction of through-traffic lanes shall be minimized. A flag person shall be provided to guide traffic properly and ensure safety at construction sites. 7. Portable engines and portable engine-driven equipment units used on the project site, with the exception of on-road and off-road motor vehicles, may require CARB Portable Equipment Registration with the state or a local district permit. The owner/operator of the equipment shall be responsible for arranging appropriate consultations with CARB or the FRAQMD to determine registration and permitting requirements before the equipment is operated at the site. 8. The project proponent shall assemble a comprehensive inventory list (i.e., make, model, engine year, horsepower, emission rates) of all heavy-duty off-road (portable and mobile) equipment (50 horsepower and greater) that will be used an aggregate of 40 or more hours for the construction project and provide a plan for approval by FRAQMD demonstrating that the heavy-duty (equal to or greater than 50 horsepower) off-road equipment to be used for construction, including owned, leased, and subcontractor vehicles, will achieve a project wide fleet-average 25% NO_X reduction and 45% particulate reduction compared to the most recent CARB fleet average at the time of construction. These equipment emission reductions can be demonstrated using the most recent version of the Construction Mitigation Calculator developed by the SMAQMD. Acceptable options for reducing emissions may include use of late-model engines, low emission diesel products, alternative fuels, engine retrofit technology (Carl Moyer Guidelines), after-treatment products, voluntary off-site mitigation projects, the provision of funds for air district off-site mitigation projects, and/or other options as they become available. In addition, implementation of these measures would also result in a 5% reduction in ROG emissions from heavy-duty diesel equipment. FRAQMD shall be contacted to discuss alternative measures.		
3.2-2: Operation of the proposed project would generate long-term emissions of criteria pollutants that could exceed FRAQMD, PCAPCD or SMAQMD-recommended thresholds.	LS	LS	None Required.	NA	NA

LS = less than significant; NA = not applicable; S = significant

TABLE ES-1.
SUMMARY OF IMPACTS AND MITIGATION MEASURES

Impact	Significance Before Mitigation		Mitigation Measure	Significance After Mitigation	
	Initial	Future		Initial	Future
3.2-3: Construction and operation of the project would not result in a cumulatively considerable increase in GHG emissions and would not either directly or indirectly, have a significant impact on the environment or conflict with any applicable plan, policy or regulation of an appropriate regulatory agency adopted for the purpose of reducing GHG emissions.	LS	LS	None Required.	NA	NA
3.3 Biological Resources					
3.3-1: Implementation of the proposed project could place fill material into jurisdictional waters of the United States which could result in the potential loss and degradation of wetland habitats protected under federal, State and local regulations.	S	S	3.3-1 The project applicants shall retain a qualified biologist to delineate all wetlands and waters of the United States within the proposed project. The findings shall be documented in detailed reports and submitted to USACE for verification as part of the formal Section 404 wetland delineation process. The County shall ensure the avoidance of any net loss of wetland function and values for direct and indirect impacts to wetlands subject to federal, state, and/or local jurisdiction, and the project applicants shall secure applicable permits and regulatory approvals described below and shall implement all permit conditions: • If there would be unavoidable impacts on habitats under USACE jurisdiction for direct and indirect impacts requiring a Section 404 permit, the Section 404 permitting process shall be completed and authorization shall be secured before any fill is placed in jurisdictional wetlands or other waters of the United States. The acreage of jurisdictional wetlands affected shall be replaced so as to ensure no net loss of functions and values, in accordance with USACE regulations. The range of compensation for fill of jurisdictional waters could be less than 1:1 or more than 1:1, depending on the timing, functions, and values of the jurisdictional waters created for compensation. The final compensatory range shall be negotiated with the resources agencies and specified in regulatory permits issued for the proposed project. • Habitat restoration, rehabilitation, and/or replacement shall be at a location and shall be conducted by feasible methods agreeable to USACE, the County, or other applicable agencies (depending on which agency has permitting authority). Agreement by the applicable agencies shall be obtained before the start of any grading activities that could affect wetland features. Methods for designing and implementing restored, rehabilitated, and replacement wetlands shall be determined by qualified restoration ecologists and geomorphologists to ensure that the desired results are achievable. The design shall include features to maximize the long-term maintenance of functions and values (e.g., fencing) and success criteria. A minimum of 5 years of monitoring shall be required for all restored, rehabilitated, and replacement wetlands. A monitoring plan shall be developed that includes remedial actions to be taken if the success criteria are not met. Before the mitigation design and monitoring plan are finalized, the project applicant(s) shall obtain the	LS	LS

LS = less than significant; NA = not applicable; S = significant

TABLE ES-1.
SUMMARY OF IMPACTS AND MITIGATION MEASURES

Impact	Significance Before Mitigation: Initial	Significance Before Mitigation: Future	Mitigation Measure	Significance After Mitigation: Initial	Significance After Mitigation: Future
3.3 Biological Resources (cont.)					
3.3-1 (cont.)			approval of USACE, RWQCB, and CDFW, as appropriate, indicating that the planned features are sufficient to replace lost habitat values at equivalent or higher levels. Compensation requirements shall be evaluated in conjunction with any benefits obtained through compliance with the NBHCP. • A streambed alteration agreement shall be obtained for any unavoidable impacts on habitats regulated under Section 1602 of the California Fish and Game Code, and affected habitats shall be mitigated on a no-net-loss basis. Habitat restoration, rehabilitation, and/or replacement shall be at a location and shall be conducted by methods agreeable to CDFW. Minimization and compensation measures adopted through the Section 1602 permitting process shall be implemented. • Water quality certification pursuant to Section 401 of the CWA shall be obtained from the RWQCB as required for any USACE permit. Any measures required as part of the issuance of water quality certification shall be implemented. • A report of waste discharge shall be filed for any waters of the state with the RWQCB.		
3.3-2: The proposed project could result in a cumulatively considerable net increase of any criteria pollutant for which the project region is in nonattainment under an applicable federal or state ambient air quality standard (including releasing emissions which exceed quantitative thresholds for ozone precursors).	S	S	3.3-2 Implement Mitigation Measure 3.3-1.	LS	LS
3.4 Cultural Resources					
3.4-1: Implementation of the proposed project could cause a substantial adverse change in the significance of a unique archaeological resource, including human remains.	S	S	3.4-1 Implement 2009 SPSP EIR Mitigation Measure 3.15-2 specific for all on- and off-site elements. To reduce impacts on potentially undiscovered cultural resources, the project applicant(s) of all project phases shall do the following: • Before the start of construction activities, the project applicant(s) of all project phases shall retain a qualified archaeologist to conduct training for construction workers, to educate them about the possibility of encountering buried cultural resources and inform them of the proper procedures should resources be encountered. • The project applicant(s) of all project phases, including off-site elements, shall retain a qualified archaeologist who is trained in the identification of buried deposits to be present for all ground-disturbing activities within 1,000 feet of Curry Creek, which is located within Phase D and Phase 4 of project development.	LS	LS

LS = less than significant; NA = not applicable; S = significant

TABLE ES-1.
SUMMARY OF IMPACTS AND MITIGATION MEASURES

Impact	Significance Before Mitigation: Initial	Significance Before Mitigation: Future	Mitigation Measure	Significance After Mitigation: Initial	Significance After Mitigation: Future
3.4 Cultural Resources (cont.)					
3.4-1 (cont.)			• The project applicant(s) of all project phases shall temporarily suspend all ground-disturbing activity if previously undocumented archaeological materials (e.g., remains of historic buildings or structures; deposits or scatters of historic artifacts; or prehistoric artifacts such as stone tool flaking debris, mortars, pestles, shell, or bone) are encountered during project construction. At that time, the project applicant(s) shall retain a qualified archaeologist. Construction activities shall be suspended within a 100-foot radius of the find or a distance determined by a qualified archaeologist to be appropriate based on the potential for disturbance of additional resource-bearing soils. The archaeologist shall conduct a field investigation of the specific site and recommend specific treatment measures deemed necessary to protect or recover any cultural resources concluded by the archaeologist to represent significant or potentially significant resources as defined by CEQA. Specific treatment measures include but are not limited to avoiding the resource or conducting data recovery and recordation. The applicant(s) shall implement all of the archaeologist's feasible recommendations to the satisfaction of the County before construction resumes in the area where cultural materials were discovered.		
3.4-2: Implementation of the proposed project could disturb human remains, including those interred outside of formal cemeteries.	S	S	3.4-2 Implement 2009 SPSP EIR Mitigation Measure 3.15-3 for all on- and off-site elements of the SPSP. In accordance with the California Health and Safety Code, if human remains are uncovered during ground disturbing activities, including those associated with off-site improvements, the project applicant(s) shall immediately halt potentially damaging excavation in the area of the burial and notify the County coroner and a professional archaeologist to determine the nature of the remains. The coroner is required to examine all discoveries of human remains within 48 hours of receiving notice of a discovery on private or public lands (Health and Safety Code Section 7050.5[b]). If the coroner determines that the remains are those of a Native American, he or she must contact the NAHC by phone within 24 hours of making that determination (Health and Safety Code Section 7050[c]). After the coroner's findings are complete, the project applicant(s), an archaeologist, and the NAHC-designated Most Likely Descendant (MLD) shall determine the ultimate treatment and disposition of the remains and take appropriate steps to ensure that additional human interments are not disturbed. The responsibilities for acting on notification of a discovery of Native American human remains are identified in Section 5097.9 of the California Public Resources Code. Upon the discovery of Native American remains, the procedures above regarding involvement of the County coroner, notification of the NAHC, and identification of an MLD shall be followed. The applicant(s) shall ensure that the immediate vicinity (according to generally accepted cultural or archaeological standards and practices) is not damaged or disturbed by further development activity until consultation with the MLD has taken place. The MLD shall have at least 48 hours after being granted access to the site to inspect the site and make recommendations. A range of possible treatments for the remains may be discussed: nondestructive removal and analysis,	LS	LS

LS = less than significant; NA = not applicable; S = significant

TABLE ES-1.
SUMMARY OF IMPACTS AND MITIGATION MEASURES

Impact	Significance Before Mitigation: Initial	Significance Before Mitigation: Future	Mitigation Measure	Significance After Mitigation: Initial	Significance After Mitigation: Future
3.4 Cultural Resources (cont.)					
3.4-2 (cont.)			preservation in place, relinquishment of the remains and associated items to the descendants, or other culturally appropriate treatment. As suggested by Assembly Bill (AB) 2641 (Chapter 863, Statutes of 2006), the concerned parties may extend discussions beyond the initial 48 hours to allow for the discovery of additional remains. AB 2641(e) includes a list of site protection measures and states that the applicant(s) shall comply with one or more of the following requirements: • Record the site with the NAHC or the appropriate Information Center. • Use an open-space or conservation zoning designation or easement. • Record a document with the county in which the property is located. The project applicant(s) or its authorized representative shall rebury the Native American human remains and associated grave goods with appropriate dignity on the property in a location not subject to further subsurface disturbance if the NAHC is unable to identify an MLD or if the MLD fails to make a recommendation within 48 hours after being granted access to the site. The applicant(s) or its authorized representative may also reinter the remains in a location not subject to further disturbance if it rejects the recommendation of the MLD and mediation by the NAHC fails to provide measures acceptable to the landowner. Ground disturbance in the zone of suspended activity shall not recommence without authorization from the archaeologist.		
3.4-3: Implementation of the proposed project could cause a substantial adverse change in the significance of a tribal cultural resource as defined in PRC Section 21074.	S	S	3.4-3 Implement Mitigation Measures 3.4-1 and 3.4-2.	LS	LS
3.5 Wastewater Conveyance and Treatment					
3.5-1: The proposed project could exceed existing wastewater conveyance capacity.	LS	LS	None Required.	NA	NA
3.5-2: The proposed project could result in a determination by the wastewater treatment provider that serves or may serve the project that it has inadequate capacity to serve the project's projected demand in addition to the provider's existing commitments.	LS	LS	None Required.	NA	NA

LS = less than significant; NA = not applicable; S = significant

TABLE ES-1.
SUMMARY OF IMPACTS AND MITIGATION MEASURES

Impact	Significance Before Mitigation: Initial	Significance Before Mitigation: Future	Mitigation Measure	Significance After Mitigation: Initial	Significance After Mitigation: Future
3.6 Noise					
3.6-1: Project construction could expose persons to or generate noise levels in excess of standards established in the local general plans or noise ordinances, or applicable standards of other agencies.	LS	LS	None Required.	NA	NA
3.6-2: Project operation could expose persons to or generate noise levels in excess of standards established in the local general plans or noise ordinances, or applicable standards of other agencies.	LS	LS	None Required.	NA	NA
3.6-3: Project construction would expose persons to or generate excessive ground-borne vibration or ground-borne noise levels.	LS	LS	None Required.	NA	NA
3.6-4: The proposed project would cause a substantial permanent increase in ambient noise levels in the project vicinity.	LS	LS	None Required.	NA	NA

LS = less than significant; NA = not applicable; S = significant

CHAPTER 1
Introduction

1.1 Introduction and Background

Pursuant to the California Environmental Quality Act (CEQA), Sutter County as the CEQA Lead Agency has prepared this Environmental Impact Report (EIR) for the Sutter Pointe Regional Wastewater Conveyance project (proposed project). The proposed project would extend wastewater service from the Upper Northwest Interceptor (UNWI), operated by the Sacramento Regional County Sanitation District (Regional San), to the Sutter Pointe Specific Plan (SPSP) area. Wastewater service to the SPSP area would be provided by the Regional San and the Sacramento Area Sewer District (SASD) under a Wastewater Service by Contract and Operating Agreement between Regional San, SASD, and Sutter County (Agreement). The proposed project would include on- and off-site facilities needed to convey future wastewater flows from the SPSP area to the UNWI; including pumping facilities and parallel force mains, for conveyance to the Sacramento Regional Wastewater Treatment Plant (SRWTP) for treatment. The proposed parallel force mains would extend from the SPSP area to a point of connection with the UNWI near the intersection of West (W.) 6th Street and Elkhorn Boulevard (Blvd.) in Rio Linda, an unincorporated community in Sacramento County. SASD would provide wastewater system operation and maintenance services to the SPSP area. However, Sutter County or other party of interest could assume these duties in the future.

In November of 2004, Sutter County voters approved Measure M, an advisory measure to give the Board of Supervisors direction for the planning of growth on approximately 7,500 acres known as the SPSP area. Measure M identified the development of a mix of land uses, including industry, commerce, education, housing, recreation, and open space and would be integrated within the Natomas Basin Habitat Conservation Plan (NBHCP). An EIR for the SPSP (SCH # 2007032157) was certified by the Sutter County Board of Supervisors on June 30, 2009. The 2009 SPSP EIR included a programmatic assessment of development of the entire SPSP area and a project-level analysis for the first phase of development.

The SPSP area is not currently served by any municipal wastewater collection and treatment system. Existing residential, industrial and commercial uses within the area are served by individual on-site septic tank systems. A Sewer Master Plan was developed (2008 Sewer Master Plan) that estimated wastewater demand from development of the SPSP and presented various options for providing wastewater service to the SPSP area. It also identified on- and off-site infrastructure needs for the options. The 2008 Sewer Master Plan: (1) concluded that the

preferred options would be to extend service from the Regional San system; (2) confirmed the ability of the County to connect the Regional San system; and (3) confirmed the ability of Regional San to accept wastewater flows from the full buildout of the SPSP area. Over time, as the SPSP is built out, the 2008 Master Plan will need to be updated and future master plans will need to include additional detail on both on- and off-site infrastructure including: (1) on-site pump stations, force mains, trunk lines and major collectors; (2) facility phasing; and (3) collector and lateral systems to serve individual lots. The 2009 SPSP EIR evaluated the impacts on the environment from construction of on- and off-site wastewater conveyance infrastructure of extending service from the Regional San system to serve the SPSP presented in the 2008 Sewer Master Plan.

In 2015, the proposed project was developed to provide more detailed information about the on- and off-site infrastructure needed to serve Phase I of the SPSP and additional information on future off-site facilities that would be needed to convey future flows from the SPSP area to the UNWI. The proposed project wastewater conveyance facilities are described in more detail in Chapter 2, Project Description.

Mitigation measures adopted by the County for the SPSP included developing and executing an agreement-in-principal, a wastewater services agreement, an operations agreement, and paying connection and capacity fees to the Regional San through these agreements. In 2009, the County and Regional San entered into an agreement-in-principal (Principles of Agreement (Appendix A)) to convey wastewater flows generated within the SPSP area to the UNWI for treatment at the SRWTP and discharge to the Sacramento River. The Principles of Agreement set forth the basic terms and conditions under which Regional San would extend service to the SPSP area. It also established the framework for a future service agreement which is the Wastewater Service by Contract and Operating Agreement. The Agreement is described in more detail in Chapter 2, Project Description. This Focused Tiered EIR has been prepared to provide an assessment of the potential environmental consequences of constructing and operating the infrastructure to provide wastewater conveyance to the SPSP area.

1.2 Type of EIR

In accordance with CEQA Guidelines Section 15152, this EIR is tiered from the 2009 SPSP EIR (SCH #2007032157), which was certified by the Sutter County Board of Supervisors on June 30th, 2009. Therefore, the County has prepared a Focused Tiered EIR to address the environmental impacts associated with the construction and operation of new wastewater conveyance infrastructure to support development of the SPSP area.

1.2.1 Tiering

Tiering refers to the coverage of general environmental matters in broad, program-level (or first-tier) EIRs, such as the 2009 SPSP EIR, with subsequent (second-tier) focused environmental

documents for individual projects that implement the program (such as the proposed project). The project-level environmental document incorporates by reference the broader discussions in the Program EIR (such as the SPSP EIR) and concentrates on project-specific issues. CEQA Statutes and the Guidelines encourage the use of tiered environmental documents to reduce delays and excessive paperwork in the environmental review process. This is accomplished in tiered documents by eliminating repetitive analyses of issues that were adequately addressed in a Program EIR and by incorporating those analyses by reference. General discussions from a Program EIR may be referenced in subsequent environmental documents; however, reiterating already addressed and mitigated impacts from the Program EIR is unnecessary.

Tiering allows subsequent environmental review to rely on a Program EIR for the following:

- A discussion of general background and setting information for environmental topic areas,
- Issues that were evaluated in sufficient detail in the Program EIR and for which there is no significant new information or change in circumstances that would require further analysis,
- Long-term cumulative impacts, and
- Overall growth-related issues.

As stated above, tiering is a beneficial tool for lead agencies in that it allows for the elimination of repetitive issues which have already been addressed in a Program EIR and focuses on issues which require further analysis in the second-tier environmental document.

This "stream-lined" process does not alleviate the need for the lead agency to adequately analyze reasonably foreseeable significant environmental impacts which a project may cause if the impacts were not adequately analyzed in the Program EIR. Significant impacts are considered to have been adequately addressed by a Program EIR where:

- The impacts were mitigated or avoided in connection with a Program EIR.
- The impacts were examined at a sufficient level of detail in the Program EIR to enable the effects to be mitigated or avoided by project-level revisions, conditions, or other means.

In the case of this Focused EIR tiered from the 2009 SPSP EIR, mitigation measures identified in the SPSP EIR that would mitigate impacts of the proposed project are identified in the technical sections of Chapter 3 and Appendix B of this Focused Tiered EIR. Applicable 2009 SPSP EIR (SCH #2007032157) mitigation measures were adopted by the Sutter County Board of Supervisors on June 30, 2009. The 2009 SPSP EIR mitigation measures incorporated into the proposed project would be implemented, enforced, and monitored as defined in the Mitigation Monitoring and Reporting Program (MMRP) for the 2009 SPSP EIR. The County would ensure that construction and operation of the proposed project would be implemented consistent with the mitigation, monitoring and enforcement requirements of the 2009 SPSP EIR MMRP.

Other recommended mitigation measures for project-specific and cumulative significant impacts identified in this Focused Tiered EIR which were not included in the 2009 SPSP EIR are presented in Chapter 3 and Chapter 5.

1.3 Intended Uses of this Focused Tiered EIR

Sutter County is the lead agency for the purposes of complying with CEQA (Public Resources Code Section 21000 et seq.) of 1970 (as amended), and the Guidelines for Implementing the California Environmental Quality Act (California Code of Regulations, Title 14). The County has prepared this Focused Tiered EIR to provide the public and responsible and trustee agencies with information about the potential environmental effects of the proposed project. Section 2.6 in Chapter 2, Project Description provides a list of all responsible and trustee agencies and their roles in this project.

As described in CEQA Guidelines Section 15121(a), an EIR is a public information document that assesses potential environmental effects of the proposed project, and identifies mitigation measures and alternatives to the proposed project that would reduce or avoid adverse environmental impacts. CEQA requires that state and local government agencies consider the environmental consequences of projects over which they have discretionary authority. The County, as the lead agency for CEQA compliance, will use this Focused Tiered EIR to evaluate the proposed project's potential environmental impacts, and can further use it to modify, approve, or deny approval of a proposed project based on the analysis provided in this Focused Tiered EIR.

1.4 Environmental Review and Approval Process

The preparation of an EIR involves multiple steps wherein the public is provided the opportunity to review and comment on the content of the EIR, the scope of the analyses, results and conclusions presented, and the overall adequacy of the document to meet the substantive requirements of CEQA and provide full disclosure of the potential environmental consequences of implementing the proposed project and alternatives. The following discussion describes the major steps in the environmental review process.

1.4.1 Notice of Preparation

In accordance with Sections 15063 and 15082 of the CEQA Guidelines, the County prepared a Notice of Preparation (NOP) of an EIR and published it on January 22, 2016 (see Appendix C). The NOP was circulated to the public, local, state and federal agencies, and other interested parties to solicit comments on the proposed project for a 30-day public and agency comment period. Concerns that were raised in response to the NOP were considered during preparation of this Draft EIR and are included in Appendix C.

1.4.2 The Draft Focused Tiered EIR

This Draft Focused Tiered EIR will be available to local, state, and federal agencies and to interested organizations and individuals who may want to review and comment on the adequacy of the analysis included in the EIR. Notice of this Draft Focused Tiered EIR will also be sent directly to every agency, person, or organization that commented on the NOP. The publication of the Draft Focused Tiered EIR marks the beginning of a 45-day public review period. The 45-day public review period for the Sutter Pointe Wastewater Conveyance Project will be from August 30, 2016 through October 14, 2016 ending at 5 PM. During the public comment period, written comments should be mailed or hand delivered to:

Sutter County Development Services Department
Attention: Danelle Stylos, Director
1130 Civic Center Boulevard, Suite A
Yuba City, CA 95993
dstylos@co.sutter.ca.us

1.4.3 The Final Focused Tiered EIR

Following circulation of this Draft Focused Tiered EIR and incorporation of public comments and responses to comments, a Final Focused Tiered EIR will be published by the County. Written and oral comments received on the Draft EIR during the public review period will be addressed in a Response to Comments document which, together with the Draft EIR and any changes to the Draft EIR made in response to comments received thereon, will constitute the Final EIR. The Draft EIR and Final EIR together will comprise the EIR for the proposed project.

1.4.4 Mitigation Monitoring and Reporting Program

CEQA Section 21081.6(a) requires lead agencies to "adopt a reporting and mitigation monitoring program for the changes to the project which it has adopted or made a condition of project approval in order to mitigate or avoid significant effects on the environment." The CEQA Guidelines do not require that the specific reporting or monitoring program be included in the Draft Focused Tiered EIR. Throughout this Focused Tiered EIR, however, proposed mitigation measures have been clearly identified and presented in language that will facilitate establishment of a monitoring program. Any mitigation measures adopted by the County as conditions for approval of the project will be included in a MMRP to verify compliance.

1.4.5 Approval Process

Before the County makes a decision with regard to the proposed project, it must first certify that the EIR has been completed in compliance with CEQA, that the County has reviewed and considered the information in the EIR, and that the EIR reflects the independent judgment of the

County. The County also would be required to adopt Findings of Fact, and for those impacts determined to be significant and unavoidable, adopt a Statement of Overriding Considerations and file a Notice of Determination.

1.5 Scope of this Focused Tiered EIR

An Environmental Checklist was prepared for the proposed project that is included in Appendix B. The Environmental Checklist includes a discussion of potential environmental effects of the proposed project, identifies which issues were adequately addressed in the 2009 SPSP EIR, and identifies which issues require further analysis and are included in this Focused Tiered EIR. Based on the Environmental Checklist, and on the scoping comments received, the following issues were identified to be addressed in this Focused Tiered EIR:

- Air Quality and Greenhouse Gas Emissions – Temporary construction-related emissions associated with the proposed project.
- Biological Resources - Potential loss and degradation of jurisdictional wetlands and other waters of the United States and temporary construction-related impacts on biological resources along the project alignment.
- Cultural Resources – Potential construction-related impacts on cultural resources within and adjacent to the project alignment.
- Noise – Temporary construction-related emissions associated with the proposed project.
- Wastewater Utilities – Potential impacts on the capacity of existing wastewater conveyance and treatment facilities.

For the topic areas listed below, it was concluded that the existing analysis in the 2009 SPSP EIR was adequate and these topics are not further evaluated in this Focused Tiered EIR. A more detailed discussion of these topic areas is provided in Appendix B.

- Aesthetics
- Agriculture and Forestry Resources
- Geology and Soils
- Hazards and Hazardous Materials
- Hydrology and Water Quality
- Land Use and Planning
- Mineral Resources
- Population and Housing
- Public Services
- Recreation

- Transportation and Circulation
- Utilities and Service Systems

1.6 EIR Organization

This Draft EIR is organized into seven chapters and appendices as described in the following text.

Executive Summary. The Executive Summary presents a summary of the project description, a description of issues to be resolved, the significant environmental impacts that would result from project implementation, and mitigation measures proposed to reduce or eliminate those impacts.

Chapter 1, Introduction. Chapter 1 includes project background information and describes the intended uses of this Focused Tiered EIR type of EIR, the environmental review and approval process, and document organization.

Chapter 2, Project Description. Chapter 2 presents an overview of the proposed project, outlines the project objectives, and summarizes the components of the proposed project. The project description also describes subsequent development and approvals for which this Focused Tiered EIR may be used.

Chapter 3, Environmental Analysis. Chapter 3 describes the existing environmental setting for each environmental issue area, discusses the project-specific environmental impacts associated with construction and operation of the proposed project facilities, and identifies mitigation measures for potential impacts.

Chapter 4, Alternatives. Chapter 4 describes potential alternatives to the proposed project, along with an analysis of suitability towards meeting proposed project objectives and differences in level of environmental impact.

Chapter 5, Other CEQA Considerations. Chapter 5 discusses other CEQA issues, including growth inducing impacts, significant unavoidable impacts on the environment, and significant irreversible environmental changes.

Chapter 6, Draft EIR Authors. Chapter 6 provides the names of the Focused Tiered EIR authors and consultants, and agencies or individuals consulted during preparation of the Focused Tiered EIR.

Chapter 7, Bibliography. This chapter lists all the references cited in the Focused Tiered EIR.

Appendices. The appendices include materials that support the findings and conclusions presented in the text of the Focused Tiered EIR, including the Environmental Checklist.

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CHAPTER 2
Project Description

2.1 Project Overview

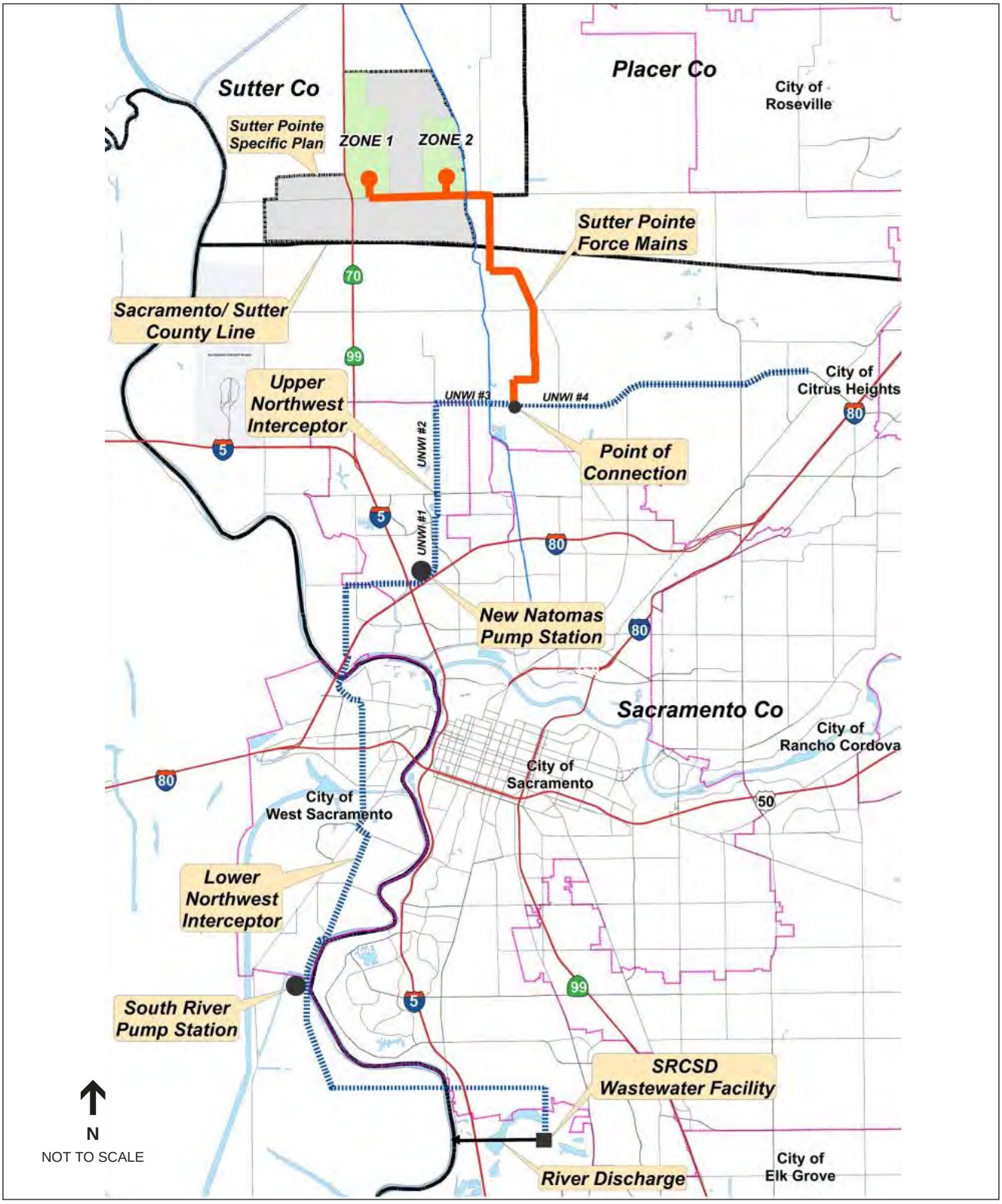
This chapter provides a summary of the proposed project objectives, description of proposed project elements, construction considerations, project schedule, approvals, and permits that would be required to implement the proposed project. As previously stated in Chapter 1, Introduction of this EIR, the proposed project would extend sewer service from the UNWI, operated by Regional San, to the SPSP.

Wastewater service to the SPSP would be provided by the Regional San and the SASD under a Wastewater Service by Contract and Operating Agreement by and between Sutter County, Regional San and SASD. The proposed project would include the construction of pumping facilities and parallel force mains from the SPSP to a point of connection with the UNWI near the intersection of West (W.) 6th Street and Elkhorn Boulevard (Blvd.) in Rio Linda, an unincorporated community in Sacramento County. SASD would provide wastewater system operation and maintenance services to the SPSP area. However, Sutter County or other party of interest could assume these duties in the future.

Construction of proposed project facilities would be phased. Two initial pumping stations and one of two planned force mains that would connect the SPSP to the UNWI would be installed and operated first. These initial facilities are being evaluated at a project level in this Draft EIR. A future regional pump station and the remaining force main would be installed and operated at a later date and are evaluated at a program level in this Draft EIR. The proposed project elements are described in detail below.

2.2 Project Location

The proposed project would initiate within the SPSP area. The SPSP area encompasses approximately 7,500 acres in south Sutter County, immediately north of the Sutter/Sacramento County line. The SPSP area is located approximately 12 miles north of downtown Sacramento and two miles northeast of Sacramento International Airport. The Sacramento River is situated about one mile west of the SPSP area (**Figure 2-1**). The SPSP area is generally bounded by Natomas Road (Rd.) on the east and Powerline Rd. on the west. The northern boundary is approximately four miles north of the Sutter County line. State Route (SR) 99/70 divides the southern portion of the SPSP area and serves as the western boundary of the northern portion of



SOURCE: MacKay & Somps 2015

Sutter Pointe Regional Wastewater Conveyance Project . 130145

Figure 2-1

Project Regional Location

the SPSP. The proposed project would include the construction of pumping facilities and parallel force mains from SPSP to a point of connection with the UNWI near the intersection of W. 6th Street and Elkhorn Blvd. in Rio Linda, an unincorporated community in Sacramento County. The proposed force main route from the SPSP area would be approximately seven miles in length. The force main route would be approximately 8.5 miles (44,825 feet) and begin at the connection with the UNWI at W. Elkhorn Blvd. to W. 6th Street, then along W. M Street, W. 2nd Street, Elwyn Avenue, Rio Linda Blvd., Pleasant Grove Rd., and W. Riego Rd., where it would enter the SPSP area connecting with the proposed pump stations located in Zone 1 and Zone 2 (described below) as shown in **Figure 2-2**.

2.3 Proposed Objectives

The CEQA Guidelines (Section 15124) state that project objectives should be a statement of the objectives that will help develop a reasonable range of alternatives and aid decision makers in preparing findings and overrides. It should also include the underlying purpose of the project. Therefore, the project objectives need to be specific enough to capture the intent of the project and to guide the development of alternatives such that they also capture the intent of the project. The objectives of the proposed project are to:

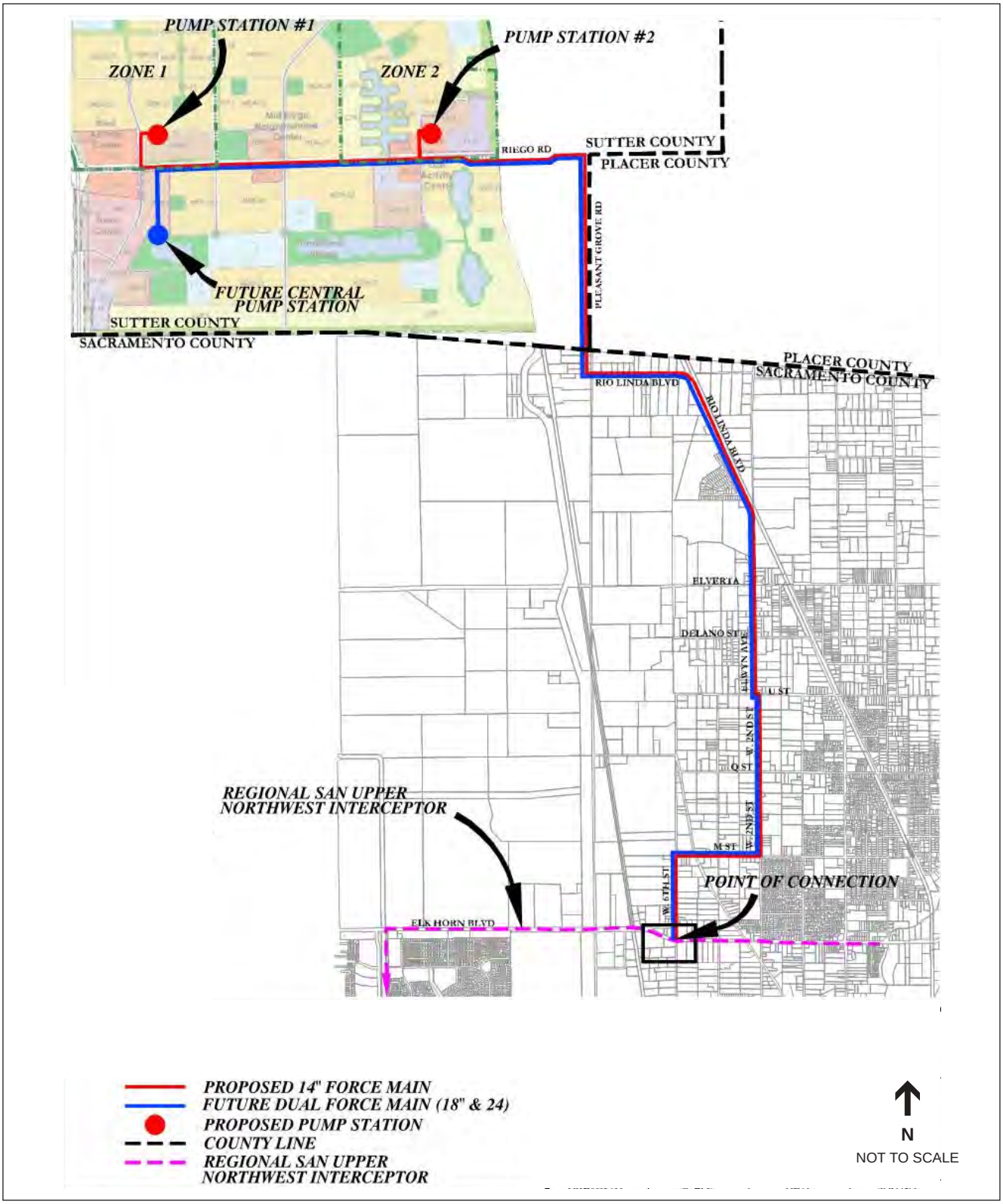
- provide adequate wastewater conveyance, treatment and discharge to support buildout of the SPSP area in compliance with the SPSP and Sewer Master Plan;
- not adversely affect the conveyance or treatment capacity of existing facilities; and,
- comply with the Natomas Basin Habitat Conservation Plan, Sacramento Area Flood Control Agency (SAFCA) flood control plans, and other regional resource conservation and land use plans.

2.4 Project Description

The specific components of the proposed project include the Agreement and updated details on the pumping facilities and parallel force mains connecting the SPSP to the UNWI. Each of these components is described in more detail below.

2.4.1 Wastewater Service by Contract and Operating Agreement

The Agreement is a three-party contract between Regional San, SASD, and the County to extend wastewater services to the SPSP area. The Agreement describes the terms and conditions under which these three agencies would divide the responsibilities, duties and obligations to provide wastewater service to the SPSP. Specifically, the Agreement addresses the legal, operational and administrative details of providing wastewater service to the SPSP area. No physical facilities are proposed as part of the Agreement; physical facilities are identified as part of the proposed project, as described below. Under the terms of the Agreement, the County, through a yet to be formed independent special district, would be responsible to collect wastewater flows generated



SOURCE: MacKay & Somps 2015

Sutter Pointe Regional Wastewater Conveyance Project . 130145

Figure 2-2
Project Site

from development in the SPSP area. The wastewater flows would be conveyed to the UNWI with the Regional San adjusting its operational strategy (which could include physical adjustments within existing infrastructure) to divert flows at the UNWI 4/5 junction and reduce pumping at the New Natomas Pump Station to maintain sufficient capacity for flows from the SPSP. Regional San would then convey the SPSP flows, along with the flows from its Contributing Members and Contracting Agencies,[1] to the SRWTP for treatment. After treatment, SPSP flows are discharged into the Sacramento River just downstream of the Freeport Bridge.

Under the terms of the Agreement, the respective responsibilities of the three agencies would be as follows:

- The County would be responsible for the design, construction, financing and ownership of all wastewater facilities within the SPSP area (including the off-site force mains);
- SASD would be responsible for operation and maintenance of proposed facilities using their operational resources and management expertise; and
- Regional San would accept the wastewater flows generated by development in the SPSP area at the proposed point of connection and would treat the flows at the SRWTP prior to discharge into the Sacramento River under and consistent with the terms and conditions of its National Pollutant Discharge Elimination System (NPDES) Waste Discharge Permit.

In addition to the typical terms of these types of agreements, the Agreement specifically identifies the respective duties and responsibilities of the parties in the following areas:

- *SPSP Sewer Facilities* – A description of contemplated sewer facilities; the timing, design and construction of the sewer facilities; the cost and financing of the sewer facilities; easements and rights-of-way of the sewer facilities; facility modifications (if required); and details to the future transfer of ownership of the sewer facilities.
- *Operation & Maintenance* – A description of the operation and maintenance of the sewer facilities; rights of access to the sewer facilities; odor and corrosion control; data acquisition and sharing; and non-permitted discharges and notifications.
- *Sewer System Overflow (SSO) Coordination* – Incident ownership; SSO responsibility; and SSO Reporting.
- *Planning Coordination* – Capacity planning; capacity demands and limitations; and planning updates.
- *Financial Considerations* – Accounting and billing; rates and fees; industrial pre-treatment; audits; repairs and replacements; wastewater source control programs, and other costs.

[1] Regional San provides service to the cities of Sacramento, West Sacramento, Citrus Heights, Elk Grove, Folsom, and Rancho Cordova; unincorporated Sacramento County; and the communities of Courtland and Walnut Grove. Contracting agencies include SASD and the cities of Folsom, Sacramento and West Sacramento.

- *Emergency Mutual Aid* – Mutual aid coordination; and resource utilization.

- *Adherence to Regulations* – Applicable laws and regulations; coordination on regional sewer ordinance issues; and wastewater discharge pretreatment program.

The Agreement contemplates that the County would be responsible to pay all applicable rates of SASD and all applicable rates and fees of Regional San for each of the County's users that contribute flow to SPSP system and discharges into the Regional San system. Additionally, the County would have the responsibility to comply with the requirements of Proposition 218 as it relates to those users who use the SPSP sewer system. The Agreement also requires the parties to track their various costs and revenues over time and each agency would be appropriately reimbursed by the others at specified intervals.

2.4.2 Wastewater Conveyance Project

The SPSP area will be developed in phases over time. The initial phase (Phase 1 or Initial Development Area) includes the development of approximately 2,100 acres (Zone 1 and Zone 2 on Figure 2-2) and 12,600 equivalent single family dwellings (ESDs) of wastewater demand (calculated at an average density of 6 ESDs/acre). The land uses for the Phase 1 Area include: low, medium and high-density residential, schools, parks and open space, detention basins, commercial and employment uses. The sequence of development within the Phase 1 Area would occur in phases and/or sub-phases, which could change and/or move forward out of sequence, subject to County approval, providing that improvements necessary to serve the Initial Development Area are sufficient to provide reliable wastewater conveyance service.

The proposed project includes the construction and operation of wastewater conveyance facilities necessary to convey flows from a portion of the Initial Development Area equal to approximately 550 acres and 3,300 ESDs (2.51 million gallons per day [mgd] Peak Wet Weather Flow [PWWF]). As the SPSP area develops over time, additional wastewater pumping and conveyance facilities would be required. Proposed Initial Development Area and future wastewater infrastructure that are evaluated in this EIR are described below.

Initial Development Area Facilities

Proposed Initial Development Area facilities include two medium capacity, on-site wastewater pump stations and one force main connecting the pump stations with the UNWI. Pump stations would be installed below ground in a concrete vaults with control and electrical equipment located above ground in a fenced and secured area above the pump station (approximately 120 feet by 120 feet, or approximately14,400 square feet each). The pump stations would be covered and the fenced and secure area would be paved with asphaltic concrete, including the access driveways.

One pump station (1.53 mgd PWWF) would be located within Zone 1 and one pump station (2.51 mgd PWWF) would be located within Zone 2 (see Figure 2-1). Two miles of 12-inch

diameter force main would connect the Zone 1 and Zone 2 pump stations and a seven mile long 14-inch diameter force main would connect the Zone 2 pump station to the point of connection with the UNWI in Sacramento County (a total of nine miles of pipe). Zone 1 and Zone 2 could be developed independently or concurrently. In the case that either zone moves forward independently, the pump stations and force main would be phased accordingly. The alignment of the force main once it leaves the SPSP area is as follows:

1. East on Riego Rd. to Pleasant Grove Rd. for approximately 1.2 miles. Within this length of force main the alignment would transition from the north to the south outside the roadway westerly of the Natomas East Main Drainage Canal (NEMDC, also known as Steelhead Creek);
2. South on Pleasant Grove Rd. for approximately 1.3 miles;
3. East on Rio Linda Blvd. and following it southerly for a total distance of approximately 2.3 miles to Elwyn Avenue;
4. South on Elwyn Avenue for approximately one mile to U Street;
5. East on U Street for 150 feet to W. 2nd Street;
6. South on W. 2nd Street for approximately one mile to M Street;
7. West on M Street for approximately one-half mile to W. 6th Street; and
8. South on W. 6th Street for approximately one-half mile where the force main would connect to the SASD UNWI at the intersection of Elkhorn Blvd.

Although Regional San believes that the New Natomas Pump Station has the capability to control odors at the point of connection, there is a possibility that there may not be enough of a vacuum in the UNWI to control all odors from escaping at the point of connection. Therefore, in order to prevent the escape of odors from the discharge manhole, as part of the proposed project, an odor control facility may be built at the point of connection. If required, the proposed odor control facility would consist of exhaust fans that would create a partial vacuum within the manhole to draw any noxious odors into the building to pass through carbon filters prior to releasing to the atmosphere. The odor control system would be located in a small building on an approximately 2,500 square-foot site directly adjacent to the existing UNWI easement area at the southwest corner of Elkhorn Blvd. and W. 6th Street. This facility would be powered by electricity from the adjoining SMUD power lines, with an auxiliary generator to provide standby power during power outages.

Future Facilities

As the SPSP area develops over time, additional wastewater pumping and conveyance facilities would be required. These improvements would be phased in over time as demands increase. Trunk sewer lines in future areas to be developed under the SPSP would convey wastewater to a Central Pumping Station (23.1 mgd PWWF). The Central Pumping Station is planned to be located at the western end of the Great Park as the park is shown on the approved SPSP land use

plan. The Central Pumping Station would then pump these flows into a 24-inch force main that would convey the flow to the UNWI. The future force main would be phased into service prior to wastewater flows from the SPSP area exceeding the capacity of the proposed 14-inch diameter force main. The route of the future force main would follow the same general alignment as the proposed initial facilities force main described above.

2.4.3 Construction Considerations

Pump Stations

Each pump station would require a deep, open pit excavation approximately 30 feet in depth. A pump station would be constructed in the excavation and then the excavation would be backfilled. Following installation of the pump station structure, pumping equipment (pumps, motors, valves and piping) and motor control system improvements would be installed. Electrical power, emergency diesel-powered generator, and telecommunications facilities for telemetry control of the operation of the pump station would also be installed and an all-weather access road would be constructed. Once the installation is complete disturbed areas would be restored to pre-construction conditions. The pump station sites would be paved and fencing and landscaping would be installed.

Force Mains

Most of the proposed force mains would be installed within existing roadway rights-of-way (ROW). A portion of the proposed alignment would occur outside of the existing roadway within future Roads 1 and 2 within the SPSP area, along the southerly side of the future bridges across the Natomas Main Drainage East Canal (NMDEC) and the existing railroad tracks. Small portions of the alignment along the route of the force mains fall outside of the existing roadways and/or require access to private property. In these cases, the project applicants would obtain the necessary ROW and permanent and/or temporary construction easements from the affected property owners to permit construction of the force mains.

The proposed force mains would be constructed using a combination of open trench, bore and jack, and horizontal directional drilling (HDD) construction methods. Open trenching would be used except where the force main is proposed to be installed under existing surface features such as the Natomas East Levee, the NMDEC and the railroad tracks using jack and bore construction techniques. There are several locations where the force mains would cross local drainage features (culverts). Where the alignment would cross a culvert, the culvert would be cut through or removed, and then replaced after construction of the force main. Where the force mains would cross an existing bridge structure, it would be attached to the outside of the bridge.

Open trench construction methods would consist of the excavation of a shallow trench, typically 3-1/2 feet wide by 6 feet deep. Trench walls would be shored up when more than five feet in depth. The floor of the trench would be prepared with imported pipe bedding material (typically imported sand), and then the force main pipes would be installed and covered with initial backfill

material (typically imported sand). After compaction of the bedding and initial backfill material, the trench would be backfilled with native materials to pavement subgrade level. The top surface of the trench and all disturbed pavement areas would be repaved with temporary paving until the trench settlement period has elapsed. Then permanent asphalt concrete over aggregate base in like kind and depth to the existing pavement would be installed. In unpaved areas, the surface of the trench and all disturbed areas would be restored to existing conditions and revegetated with native plant materials.

In areas where a bore and jack construction methods would be used, a bore pit would be excavated at each end of the bore location (typically 15 feet wide by 30 feet long by 6 feet deep). A boring machine would be positioned in one of the pits and a casing pipe would be "bored and jacked" under the surface obstruction. Then the force mains would be slipped into the casing pipes and the area between the force main pipes and the carrier pipes would be backfilled with air blown sand. The boring would then be closed up and the bore pits backfilled.

The crossing of the Natomas East Levee, the NEMDC and the Union Pacific railroad tracks will be accomplished utilizing HDD construction methods. This crossing will require the approval of Reclamation District (RD) 1000, SAFCA , the Central Valley Flood Protection Board (CVFPB), U.S. Army Corps of Engineers (USACE) and Union Pacific Railroad (UPRR). The crossing will need to comply with the requirements of the various permits issued by these entities (CVFPB standards for HDD per Section 123 of Title 23 of the California Code of Regulations, and USACE standards for HDD per Section 408 of the Rivers and Harbors Act of 1899, Flood Protection and Navigation Section).

An HDD pilot bore will be launched from drilling rig downward at a diagonal angle maintaining an arch until the required horizontal depth is reached. The drill rig will be located approximately 300 feet west of the existing levee and the exit point of the pilot bore will be located approximately 200 feet east of the railroad tracks – a bore distance of approximately 1,000 feet. The drill rig operator will "guide" the drill head horizontally under the levee, canal and railroad tracks and then upwards to the exist point. The exact locations of the pilot bore and the exist point, as well as the depth of the bore hole under the levee, canal and railroad, would be determined during final design and would be dictated to a large degree by the permit requirements of RD 1000, CVFPB, USACE and/or UPRR.

The USACE standards for installation of pressurized pipes under a levee requires a minimum of 50 feet of cover below natural ground surface to the top of the pipe. In addition, the USACE have the following criteria for HDD installations under a levee:

a. The levee needs to be monitored for vertical and horizontal displacements during pipe installation at both the levee crown and landside toe. The USACE must be notified if displacement greater than 0.01-feet occurs. In case of damages to the levee due to pipe installation, the levee must be reconstructed to its original geometry. In the case of need for repair of the levee, the repair method must be approved by the USACE prior to construction.

b. Plans for monitoring and controlling drilling fluid pressures and for avoiding inadvertent returns shall be submitted for review. The limiting pressures shall be estimated prior to construction, clearly stated in the contract documents and required in contractor's submittals.

c. Any surface evidence of drilling fluid return or any surface fracturing will require complete excavation and removal of the affected foundation blanket and flood protection levee. Levee and blanket replacement shall meet approved USACE design standards and be approved prior to construction.

d. The directional drilling effort shall be a continuous action. The drilling should not stop from the start of the bore to the end of the drilling. The amount of material removed during excavation will be monitored to ensure excessive material is not excavated and that the annular space is minimized.

e. Any evidence of impending danger to the flood protection project requires immediate notification to the USACE. If any adverse levee impacts threaten the functioning of the levee, the drilling operation shall immediately cease, all construction equipment be pulled and the entire drilled cavity grouted. Sufficient grout must be available on site to accomplish this objective.

Once the pilot hole is completed, the cutting head is replaced with a back reamer and swivel. The drill rod is then pulled back towards the drilling rig, reaming and over-cutting the pilot hole to the desired diameter while simultaneously pulling back the sewer force main pipe.

During the boring and back reaming processes, drilling fluids are injected under pressure. The drilling fluid, a natural non-toxic material, mixes with the soil cuttings to form a mud-like filter cake along the perimeter of the borehole. This filter cake minimizes the loss of drilling fluids by absorption into the surrounding native soils, stabilizes the borehole and also reduces the friction on the sewer force main pipe during the pullback operation. The drilling fluid also suspends and transports drill cuttings back to the surface and reduces the shear strength of the soil to enable easier displacement during the pullback operation. Finally, to prevent seepage and erosion along the completed pipeline, the annular space between the pipe and the borehole cavity will be grouted with a cement-bentonite grout.

During the drilling process, the drilling head is continually tracked by interpreting electromagnetic signals sent by the cutting head and back reamer to a receiver at the surface. These signals allow the drill rig operator to monitor the position, depth of cover and orientation of the drilling head, and thus navigate the drill head to its proposed target. In this way, an experienced HDD drill rig operator following good drilling practices can direct the drilling operation to successful completion.

Approximately 1,000 linear feet of force main would be installed per day. Due to the linear nature of the force mains, and the narrow width of the existing roads within which the majority of the force mains are proposed to be installed, the work area for the construction of the force mains would be limited. Accordingly, it is anticipated that some road closures would be necessary to

accommodate installation of the force mains. Roadways would be open to two lanes of traffic during non-working (night-time) hours with trench plates covering all open trenches within roadways during off construction hours.

Construction Staging

Construction staging and laydown areas (staging areas) would be strategically located throughout the project area. Due the size of the project area (approximately nine miles in length), several on- and off-site staging areas would be required. All staging areas would be constructed and maintained in accordance with the requirements of the Construction General Permit (Order No. 2009-0009-DWQ, NPDES General Permit No. CAS000002), and the Best Management Practices standards of the California Stormwater Quality Association (BMP Standards), as approved by the Central Valley Regional Water Quality Control Board. The construction contractor(s) working on the project would be required to comply with the requirements of the BMP Standards, including the construction and operation of the staging areas. Staging areas would include gravel access driveways to minimize the tracking of dirt onto public roads, spill containment facilities, and concrete washout areas. Whenever practical, construction materials, supplies, and equipment would be stored inside a staging area. Upon completion of construction activities, leftover construction materials would be removed and the areas would be regraded and restored to existing conditions and revegetated with native plant materials.

One on-site staging area would be located near each of the proposed pump stations. These staging areas would accommodate and support the construction activities of the pump stations (including storage of pump station materials and equipment) and the force mains (including storage of force main piping materials and supplies). The on-site staging areas would each cover an area of approximately two acres and they would be surrounded by a temporary six foot high chain link fence with ingress and egress driveways and gates.

It is anticipated that several off-site staging areas would be located along the route of the proposed force mains. Each staging area would be approximately one acre in size and would accommodate and support the construction activities of the proposed force mains, including storage of trench spoil materials, equipment storage, force main piping materials and other supplies.

Staging areas would be located such that wetlands, endangered species and other sensitive areas would be avoided and not adversely impacted. The contractor(s) would be required to submit a site plan for each staging area depicting graphically and with appropriate narrative description of the site and its proposed use. The contractor(s) would be required to obtain the written approval for each proposed site plan from the County of Sutter Department of Public Works prior to construction of each staging area. The contractor(s) would be required to comply with any and all conditions of approval placed on the site plans by the County of Sutter, as well as any requirements of the Counties of Placer and Sacramento for staging areas located within Sutter and Sacramento Counties, respectively.

Construction Vehicle Trips and Haul Routes

Roadways directly affected by project construction traffic include local streets providing access to the SPSP and pipeline routes, as well as several regional connectors and highways. Construction activities would include trucks hauling equipment and materials to and from work sites and staging areas, and the daily arrival and departure of the construction workers. Construction trucks on local roadways would include dump trucks, concrete trucks, and other delivery trucks. Dump trucks would be used for earth-moving and clearing, removal of excavated material, and import of fill material and other structural and paving materials. Other trucks would deliver heavy construction equipment, job trailer items, concrete forming materials, piping materials, pipes, and other miscellaneous deliveries.

For construction activities, roads being used would vary depending on the locations of sections being installed and from where construction workers would be commuting. However, it is anticipated that the following roadways would be commonly used by construction workers and as haul routes: Interstate 5 (I-5), SR 99, Riego Rd., Pleasant Grove Rd., Rio Linda Blvd., and Elverta Rd.

Other Construction Considerations

Due to the high groundwater elevations within the SPSP area and the northern portion of the force mains route, it is anticipated that dewatering would be necessary using either a well point system or an in-trench sump pump. Water from the dewatering activities would be pumped into trailer mounted settling tanks and then discharged to the local agricultural drainage system. The County would require the filing of a Notice of Intent (NOI) with the Central Valley Regional Water Quality Control Board for coverage and compliance with the requirements contained in NPDES No. CAG995001 Waste Discharge Requirements General Order for Dewatering and Other Low Threat Discharges to Surface Waters prior to discharging water to the local agricultural drainage system.

2.4.4 Project Schedule

Installation of the initial pump stations and force main would be anticipated to begin in spring 2017 and would be completed by late fall 2017, with a duration of approximately three to four months for construction of the force main, and up to eight months for construction of the pump stations. Construction work times would occur Monday through Saturday from 7 a.m. to 6 p.m. Installation of the future facilities is not scheduled at this time.

2.4.5 Workforce and Equipment

Pump Stations

The construction of the initial two pump stations would be anticipated to occur over the entire eight-month construction period. Construction of each pump station would require a crew consisting of an average of six workers over the duration of the construction period. **Table 2-1**

TABLE 2-1.
PUMP STATION CONSTRUCTION EQUIPMENT

Type of Equipment	Number of Equipment	Average Use (per day/duration)
Pickups	4	4 hours/6-8 months
Small Backhoe	1	4 hours/6-8 months
Large Excavator Backhoe	1	8 hours/2 weeks
Dump Truck	2	8 hours/2 months
Flat Bed Truck	1	4 hours/6-8 months
Vibratory Compactor	1	8 hours/1 month
Ready-mix Concrete Trucks	2	8 hours/1 month
Asphalt Paver	1	8 hours/1 week
Asphalt Roller	1	8 hours/1 week
Small Bulldozer	1	4 hours/6-8 months
Small Crane or Large Boom Truck	1	8 hours/6-8 months
15 KW Portable Generator	1	8 hours/6-8 months
Dewatering Pump System	1	24 hours/2 months

presents the construction equipment would likely be required at various times during the construction of each pump station. The estimated number of vehicles and equipment, and their estimated average use during the construction of each pump station is shown. It is anticipated that construction of the future pump station would require about the same amount of equipment over the same duration.

Force Mains

The construction of the initial force main would occur over an approximately three to four month period and would require a crew consisting of an average of 20 workers over the duration of the construction period. **Table 2-2** presents the construction equipment would likely be required at various times during the installation of the force main. The estimated number of vehicles and equipment, and their estimated average use during the installation of the force main is listed in this table. It is anticipated that construction of the future force mains would require about the same amount of equipment and over the same duration.

2.4.6 Operation and Maintenance

In accordance with the Agreement, SASD would provide operation and maintenance (O&M) services for the SPSP wastewater collection and conveyance system. SASD would perform routine preventative maintenance on the system (including pump stations, main lines). For the pump stations, maintenance activities would occur annually, quarterly, and monthly, as needed to address any mechanical, electrical, and instrumentation issues. For the force mains, maintenance would occur based on a predictive and preventive maintenance programs. Cleaning intervals would occur every two years after the first 10 years of use.

TABLE 2-2.
FORCE MAIN CONSTRUCTION EQUIPMENT

Type of Equipment	Number of Equipment	Average Use (per day/duration)
Pickups	8	4 hours/3-4 months
Small Backhoe	4	8 hours/3-4 months
Large Excavator Backhoe	2	8 hours/3-4 months
Dump Truck	4	8 hours/3-4 months
Flat Bed Truck	2	8 hours/3-4 months
Vibratory Compactor	2	8 hours/1 month
Bore and Jack Machine	1	8 hours/2 weeks
Asphalt Paver	1	8 hours/2 weeks
Asphalt Roller	1	8 hours/2 weeks
Small Loader	4	8 hours/3-4 months
Small Boom Truck	2	8 hours/3-4 months
5 KW Portable Generator	1	4 hours/3-4 months
Ready-mix Concrete Trucks	1	4 hours/3-4 months
Dewatering Pump System	1	24 hours/2 months

2.5 Rights-of-Entry, Permanent Easements and Temporary Construction Easements

Small portions of the alignment along the route of the force mains fall outside of the existing roadways and/or require access to private property. In these cases, the SPSP project applicants would obtain the necessary rights-of-entry and permanent and/or temporary construction easements from the affected property owners to permit construction of the force mains. The acquired rights-of-entry and permanent and temporary construction easements would be provided to the County of Sutter prior to construction to document that the force main can be constructed in its planned location. Similarly, the project applicants would provide the necessary rights-of-entry, permanent easements and temporary construction easements for the pump station sites.

2.6 Anticipated Regulatory Permits and Approvals

Table 2-3 lists the federal, state and local permits and regulatory approvals that are expected to be necessary for project implementation. The agencies responsible for issuing these approvals would consider the information presented in this EIR during their deliberations.

TABLE 2-3.
PERMITS AND APPROVALS POTENTIALLY NEEDED FOR IMPLEMENTATION OF THE PROPOSED PROJECT

Permit	Permitting Authority	Affected Project Elements
Federal Permits/Approvals		
Clean Water Act Section 404/ Rivers and Harbor Act Section 10 Dredge and Fill Permit	U.S. Army Corps of Engineers	Project facilities that would be constructed in Waters of the US
Federal Endangered Species Act compliance	U.S. Fish and Wildlife Service	Project facilities and activities affecting federally listed special-status species
National Historic Preservation Act Section 106 Compliance	National Historic Preservation Act Section 106 Compliance	Project activities affecting cultural resources 8,500
State Permits/Approvals		
Clean Water Act Section 401 Water Quality Certification	Central Valley Regional Water Quality Control Board	Project facilities needing Section 404 permit
Clean Water Act Section 401 Waste Discharge Requirements	Central Valley Regional Water Quality Control Board	Project facilities that would be constructed in Waters of the US
National Pollutant Discharge Elimination System General Construction Activity Permit	Central Valley Regional Water Quality Control Board	Project facilities where construction runoff would discharge into surface water
General Order for Dewatering and Other Low Threat Discharge to Surface Water Permit	Central Valley Regional Water Quality Control Board	Project facilities that would require dewatering during construction activities
California Endangered Species Act compliance	California Department of Fish and Wildlife	Project facilities and activities affecting state listed special-status species
Section 1601 et seq. Streambed Alteration Agreement	California Department of Fish and Wildlife	Construction activities that would impact the bed or banks of a stream channel
Encroachment Permit	California Department of Transportation	Project facilities and activities within Caltrans rights-of-way or easements
Local Permit/Approvals		
Encroachment Permit	Sutter and Sacramento Counties	Project facilities and activities located within rights-of-way or easements managed by Sutter and Sacramento Counties

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CHAPTER 3
Environmental Setting, Impacts, and Mitigation Measures

3.1 Introduction to the Analysis

3.1.1 Scope of the Focused Tiered EIR

Chapter 3 presents the environmental and regulatory setting, impacts, and mitigation measures for the technical issue areas in Sections 3.2 through 3.6. Based on the Environmental Checklist (Appendix B) and on the scoping comments received (Appendix C), the following technical issues were identified to be addressed in this Focused Tiered EIR:

- Air Quality and Greenhouse Gas Emissions – Temporary construction-related emissions associated with the proposed project.
- Biological Resources - Potential loss and degradation of jurisdictional wetlands and other waters of the United States and temporary construction-related impacts on biological resources along the project alignment.
- Cultural Resources – Potential construction-related impacts on cultural resources within and adjacent to the project alignment.
- Noise – Temporary construction-related emissions associated with the proposed project.
- Wastewater Utilities – Potential impacts on the capacity of existing wastewater conveyance and treatment facilities.

3.1.2 Section Format

Each section contains: (1) identification of the technical issue areas being evaluated in the section; (2) any comments received on the NOP for the issue area; (3) environmental and regulatory setting; (4) standards of significance; (5) methods of analysis; (6) proposed project impacts that are adequately analyzed in the 2009 SPSP EIR, proposed project impacts that are less than significant or result in no impact so that no further analysis is included in the Focused Tiered EIR; (7) SPSP EIR mitigation measures that will be adopted as part of the proposed project; and (8) proposed project impacts and mitigation measures.

The analysis in each of the technical issue sections incorporates by reference and summarizes relevant information from the SPSP EIR, as appropriate. The environmental setting presents the

conditions that exist prior to implementation of the proposed project, at the time of release of the NOP, and provides a point of reference (or baseline) for assessing the environmental impacts of the proposed project. Each impact and mitigation measure discussion includes an impact statement (in bold text), an explanation of the impact (as it relates to the proposed project), an analysis of the significance of the impact, identification of relevant mitigation measures (in italic text), and an evaluation of whether the identified mitigation measures would reduce the magnitude of identified impacts. Where applicable, impact discussions will separate analyses for the initial facilities from the future facilities. Each impact statement is assigned a number based on the section and the order they appear (for example, 3.2-1, 3.2-2, etc.). Mitigation measures for each impact are numbered consistent with the impact statement they apply to (for example 3.2-1(a), 3.2-1(b), 3.2-2, etc.). Cumulative impacts for each technical issue area are presented in Chapter 5.

3.1.3 Terminology

This Draft EIR uses the following terminology to describe environmental effects of the proposed project in Chapter 3:

- **Standards of Significance**: A set of criteria used by the lead agency to determine at what level or "threshold" an impact would be considered significant. Standards of Significance used in this EIR include those discussed in the CEQA Guidelines; criteria based on factual or scientific information; criteria based on regulatory standards of local, State, and federal agencies. In determining the level of significance, the analysis assumes that the proposed project would comply with relevant federal, State, and local regulations and ordinances.

- **Less Than Significant Impact**: A project impact is considered less-than-significant when it does not reach the standard of significance and would therefore cause no substantial change in the environment (no mitigation required).

- **Significant Impact**: A project impact is considered significant if it would result in a substantial adverse change in the physical conditions of the environment. Significant impacts are identified by the evaluation of project effects in the context of specified significance criteria. Mitigation measures and/or project alternatives are identified to reduce these effects to the environment where feasible.

- **Significant and Unavoidable Impact**: A project impact is considered significant and unavoidable if it would result in a substantial adverse change in the environment that cannot be feasibly avoided or mitigated to a less-than-significant level if the project is implemented. Findings of Fact and a Statement of Overriding Considerations must be adopted if impacts cannot be mitigated.

- **Mitigation Measures**: Mitigation measures from the 2009 SPSP EIR are referenced and used to mitigate impacts of the proposed project. Additional mitigation measures may be presented for those impacts that were not originally analyzed and mitigated for in the SPSP EIR. The CEQA Guidelines (Section 15370) define mitigation as:

1. Avoiding the impact altogether by not taking a certain action or parts of an action;

2. Minimizing impacts by limiting the degree of magnitude of the action and its implementation;

3. Rectifying the impact by repairing, rehabilitating, or restoring the affected environment;

4. Reducing or eliminating the impact over time by preservation and maintenance operations during the life of the action; and

5. Compensating for the impact by replacing or providing substitute resources or environments.

Subsequent to providing the mitigation measures, a significance conclusion will state what the residual impact is using the terminology listed above (e.g., less than significant).

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3.2 Air Quality and Greenhouse Gases

3.2.1 Introduction

This section addresses potential impacts associated with criteria air pollutant emissions as a result of construction and operation of the proposed project. All other impacts related to air quality including conflict with or obstruction of an air quality plan, and the creation of objectionable odors were adequately addressed in the 2009 SPSP EIR, in addition to the installation of an odor control facility under proposed project, as discussed in the Environmental Checklist included as Appendix B in this Focused Tiered EIR. All relevant information, including applicable environmental and regulatory setting, standards of significance, and mitigation measures identified in Section 3.4 of the 2009 SPSP EIR, are incorporated by reference, and summarized and updated as appropriate.

Comments on the NOP (see Appendix C) included a letter from the Feather River Air Quality Management District (FRAQMD) and the Sacramento Metropolitan Air Quality Management District (SMAQMD) that requested air quality impacts be assessed for construction and operation using their latest CEQA guidance.

3.2.2 Environmental Setting

The proposed project is located in the Sacramento Valley Air Basin (SVAB), which comprises all of Butte, Colusa, Glenn, Sacramento, Sutter, Shasta, Tehama, Yolo, and Yuba Counties; the western portion of Placer County; and the eastern portion of Solano County.

Ambient concentrations of air pollutants are determined by the amount of emissions released by pollutant sources, and the ability of the atmosphere to transport and dilute such emissions based on terrain, wind, atmospheric stability, and the presence of sunlight. Therefore, existing air quality conditions in the project area are determined by such natural factors as topography, meteorology, and climate, in addition to the amount of emissions released by existing air pollutant sources, as discussed below.

Topography, Climate, and Meteorology

Land in the SVAB is relatively flat, bordered by the northern Coast Range to the west and the northern Sierra Nevada to the east. Air flows into the SVAB through the Carquinez Strait, the only breach in the western mountain barrier, and moves across the Sacramento–San Joaquin Delta (Delta) from the San Francisco Bay Area.

The Mediterranean climate of the project area is characterized by hot, dry summers and cool, rainy winters. During summer, daily temperatures range from 50 degrees Fahrenheit (°F) to more than 100°F. The inland location and surrounding mountains shelter the area from the ocean breeze that keeps the coastal regions temperature moderate.

The mountains surrounding the SVAB create a barrier to airflow, which leads to the entrapment of air pollutants when meteorological conditions are unfavorable for transport and dilution. Poor air movement occurs most frequently in fall and winter when high-pressure cells are present over the project area and meteorological conditions are stable. The lack of surface winds during these periods, combined with the reduced vertical flow caused by less surface heating, reduces the influx of air and results in the concentration of pollutants. Surface concentrations of air pollutant emissions are highest when these conditions occur in combination with agricultural burning activities or temperature inversions, which hamper dispersion by creating a ceiling over the area and trapping air pollutants near the ground.

May through October is ozone season in the SVAB and is characterized by poor air movement in the mornings and the arrival of the Delta sea breeze from the southwest in the afternoons. In addition, longer daylight hours provide a plentiful amount of sunlight to fuel photochemical reactions between reactive organic gases (ROG) and nitrogen oxides (NO_x), which in turn result in ozone formation. Typically, the Delta breeze transports air pollutants northward out of the SVAB; however, during approximately half of the time, from July through September, a phenomenon known as the Schultz Eddy prevents this from occurring. The Schultz Eddy phenomenon causes the wind pattern to shift southward, blowing air pollutants back into the SVAB. This phenomenon exacerbates the concentration of air pollutant emissions in the air basin and contributes to violations of some ambient air quality standards.

The winds and unstable atmospheric conditions associated with the passage of winter storms result in periods of low air pollution and excellent visibility. Precipitation and fog tend to reduce or limit pollutant concentrations. For instance, clouds and fog block sunlight, which is required to fuel photochemical reactions that form ozone. Because carbon monoxide (CO) is partially water soluble, precipitation and fog also tend to reduce concentrations of CO in the atmosphere. In addition, particulate matter (PM_{10}) can be washed from the atmosphere through wet deposition processes, such as rain, snow, and fog. However, between winter storms, high pressure and light winds contribute to low-level temperature inversions and stable atmospheric conditions, resulting in the concentration of air pollutants (e.g., CO, PM_{10}).

Criteria Air Pollutants

Concentrations of criteria air pollutant are used as indicators of ambient air quality conditions. Source types, health effects, and future trends associated with each air pollutant are described below along with the most current attainment area designations and monitoring data for the project area and vicinity.

Ozone

Short-term exposure to ozone can irritate the eyes and cause constriction of the airways. Besides causing shortness of breath, ozone can aggravate existing respiratory diseases such as asthma, bronchitis, and emphysema. Ozone is not emitted directly into the atmosphere, but is a secondary air pollutant produced in the atmosphere through a complex series of photochemical reactions

involving ROG and NO_x. ROG and NO_x are known as precursor compounds for ozone. Significant ozone production generally requires ozone precursors to be present in a stable atmosphere with strong sunlight for approximately three hours. Ozone is a regional air pollutant because it is not emitted directly by sources, but is formed downwind of sources of ROG and NO_x under the influence of wind and sunlight. Ozone concentrations tend to be higher in the late spring, summer, and fall, when the long sunny days combine with regional subsidence inversions to create conditions conducive to the formation and accumulation of secondary photochemical compounds, like ozone.

Carbon Monoxide

Ambient CO concentrations normally are considered a local effect and typically correspond closely to the spatial and temporal distributions of vehicular traffic. Wind speed and atmospheric mixing also influence carbon monoxide concentrations. Under inversion conditions, CO concentrations may be distributed more uniformly over an area that may extend some distance from vehicular sources. When inhaled at high concentrations, CO combines with hemoglobin in the blood and reduces the oxygen-carrying capacity of the blood. This results in reduced oxygen reaching the brain, heart, and other body tissues. This condition is especially critical for people with cardiovascular diseases, chronic lung disease, or anemia, as well as for fetuses.

CO concentrations have declined dramatically in California due to existing controls and programs and most areas of the state including the proposed project region have no problem meeting the CO State and federal standards. CO measurements and modeling were important in the early 1980's when CO levels were regularly exceeded throughout California. In more recent years CO measurements and modeling results have not been a priority in most California air districts due to the retirement of older polluting vehicles, lower emissions from new vehicles, and improvements in fuels.

Nitrogen Dioxide

Nitrogen Dioxide (NO_2) is a reddish brown gas that is a by-product of combustion processes. NO_2 may be visible as a coloring component of a brown cloud on high pollution days, especially in conjunction with high ozone levels.

Automobiles and industrial operations are the main sources of NO_2 which is an air quality concern because it acts a respiratory irritant and is a precursor of ozone. NO_2 is a major component of the group of gaseous nitrogen compounds, commonly referred to as NO_x, which are produced by fuel combustion in motor vehicles, industrial stationary sources (such as industrial activities), ships, aircraft, and rail transit. Typically, NO_x emitted from fuel combustion are in the form of nitric oxide (NO) and NO_2. NO is often converted to NO_2 when it reacts with ozone or undergoes photochemical reactions in the atmosphere. Therefore, emissions of NO_2 from combustion sources are typically evaluated based on the amount of NO_x emitted from the source.

Sulfur Dioxide

Sulfur Dioxide (SO_2) is a combustion product of sulfur or sulfur-containing fuels such as coal and diesel. SO_2 is also a precursor to the formation of atmospheric sulfate, particulate matter and contributes to potential atmospheric sulfuric acid formation that could precipitate downwind as acid rain. Concentration rather than duration of exposure is an important determinant of respiratory effects. Exposure to high SO_2 concentrations may result in edema of the lungs or glottis and respiratory paralysis.

Particulate Matter

PM_{10} and $PM_{2.5}$ consist of particulate matter that is 10 microns or less in diameter and 2.5 microns or less in diameter, respectively. (A micron is one-millionth of a meter). PM_{10} and $PM_{2.5}$ represent fractions of particulate matter that can be inhaled into the air passages and the lungs and can cause adverse health effects. Some sources of particulate matter, such as wood burning in fireplaces, demolition, and construction activities, are more local in nature, while others, such as vehicular traffic, have a more regional effect. Very small particles of certain substances (e.g., sulfates and nitrates) can cause lung damage directly, or can contain adsorbed gases (e.g., chlorides or ammonium) that may be injurious to health. Particulates also can damage materials and reduce visibility. Large dust particles (diameter greater than 10 microns) settle out rapidly and are easily filtered by human breathing passages. This large dust is of more concern as a soiling nuisance rather than a health hazard. The remaining fraction, PM_{10} and $PM_{2.5}$, are a health concern particularly at levels above the federal and State ambient air quality standards. $PM_{2.5}$ (including diesel exhaust particles) is thought to have greater effects on health, because these particles are so small and thus, are able to penetrate to the deepest parts of the lungs. Scientific studies have suggested links between fine particulate matter and numerous health problems including asthma, bronchitis, acute and chronic respiratory symptoms such as shortness of breath and painful breathing. Recent studies have shown an association between morbidity and mortality and daily concentrations of particulate matter in the air. Children are more susceptible to the health risks of PM_{10} and $PM_{2.5}$ because their immune and respiratory systems are still developing.

Mortality studies since the 1990s have shown a statistically significant direct association between mortality (premature deaths) and daily concentrations of particulate matter in the air. Despite important gaps in scientific knowledge and continued reasons for some skepticism, a comprehensive evaluation of the research findings provides persuasive evidence that exposure to fine particulate air pollution has adverse effects on cardiopulmonary health (Dockery and Pope, 2006). The California Air Resources Board (CARB) has estimated that achieving the ambient air quality standards for PM_{10} could reduce premature mortality rates by 6,500 cases per year (CARB, 2004).

Lead

Ambient lead concentrations meet both the federal and State standards in the proposed project area. Lead has a range of adverse neurotoxin health effects, and was formerly released into the

atmosphere primarily via leaded gasoline products. The phase-out of leaded gasoline in California resulted in decreasing levels of atmospheric lead. The proposed project would not introduce any new sources of lead emissions; consequently, lead emissions are not required to be quantified and are not further evaluated in this analysis.

Existing Air Pollutant Data for the Project Vicinity

Concentrations of criteria air pollutants are measured at several monitoring stations in the SVAB. The North Highlands–Blackfoot Way (less than 10 miles to the southeast) and the Roseville-North Sunrise Avenue (less than 15 miles east of the project area) monitoring stations are the closest to the project area. **Table 3.2-1** summarizes the air quality data from these stations for the most recent three years for ozone, PM_{10} and $PM_{2.5}$, the pollutants for which Sutter County remains designated as "nonattainment" with respect to State and/or federal air quality standards.

TABLE 3.2-1.
AIR QUALITY DATA SUMMARY (2013–2015) FOR THE PROJECT AREA

		Monitoring Data by Year		
Pollutant	**Standard[a]**	**2013**	**2014**	**2015**
Ozone: North Highlands: Blackfoot Way Monitoring Station				
Maximum concentration 1-hour (ppm)[b]	0.09	0.087	**0.105**	**0.113**
Number of days state standard exceeded 1-hour		0	2	2
Maximum concentration 8-hour (ppm)[b]		**0.075**	**0.085**	**0.090**
Number of days state standard exceeded 8-Hour	0.070	6	13	8
Number of days national standard exceeded 8-Hour	0.070	0	3	3
Particulate Matter (PM_{10}): North Highlands: Blackfoot Way Monitoring Station				
Maximum concentration state measurement ($\mu g/m^3$)[b]		48	29	29
Est. days over state standard[c]	50	0	0	0
Maximum concentration national measurement ($\mu g/m^3$)[b]		48	29	29
Est. days over national standard[c]	150	0	0	0
Particulate Matter ($PM_{2.5}$): Roseville: North Sunrise Avenue Monitoring Station				
Maximum concentration national measurement ($\mu g/m^3$)[b]		57	30.7	44.1
Est. days national standard exceeded[c]	35	0	0	0
State annual average ($\mu g/m^3$)[b]	12	7.5	10.5	8.1

NOTES:

a Generally, state standards and national standards are not to be exceeded more than once per year.
b ppm = parts per million; $\mu g/m^3$ = micrograms per cubic meter.
c PM_{10} and $PM_{2.5}$ is not measured every day of the year. Number of estimated days over the standard is based on 365 days per year.

NA = Not Available. Values in **Bold** exceed the respective air quality standard.

SOURCE: California Air Resources Board (CARB), 2015a. *Summaries of Air Quality Data*, 2013-2015. Available: http://www.arb.ca.gov/adam/topfour/topfour1.php.

Greenhouse Gases

Gases that trap heat in the atmosphere are called greenhouse gases (GHGs). The accumulation of GHGs in the atmosphere has been linked to global climate change. Global climate change is a change in the average weather on earth that can be measured by wind patterns, storms, precipitation, and temperature. Although there is disagreement as to the speed of global warming and the extent of the impacts attributable to human activities, most agree that there is a link between increased emission of GHGs and long-term increases in global temperature. What GHGs have in common is that they allow sunlight to enter the atmosphere, but they also trap a portion of the outward-bound infrared radiation and warm up the air. The process is similar to the effect greenhouses have in raising their internal temperature, hence the name GHGs. Both natural processes and human activities emit GHGs.

The accumulation of GHGs in the atmosphere regulates the earth's temperature; however, emissions from human activities such as electricity production and use of motor vehicles have elevated the concentration of GHGs in the atmosphere. This accumulation of GHGs has contributed to an increase in the temperature of the earth's atmosphere and contributed to global climate change. The principal GHGs are carbon dioxide (CO_2), methane, nitrous oxide (N_2O), sulfur hexafluoride, perfluorocarbons, hydrofluorocarbons, and water vapor. CO_2 is the reference gas for climate change. To account for the individual warming potential of various GHGs, and to combine emissions of gases with differing properties, GHG emissions are typically quantified and reported as CO_2 equivalents (CO_2e).

Potential global warming impacts in California may include, but are not limited to, loss in snow pack, sea level rise, more extreme heat days per year, more high ozone days, more large forest fires, and more drought years. Secondary effects are likely to include a global rise in sea level, impacts to agriculture, changes in disease vectors, and changes in habitat and biodiversity. While the possible outcomes and the feedback mechanisms involved are not fully understood, and much research remains to be done, the potential for substantial environmental, social, and economic consequences over the long term may be great.

Sensitive Receptors

Some receptors are considered more sensitive than others to air pollutants. Reasons for greater sensitivity include pre-existing health problems, proximity to emissions source, or duration of exposure to air pollutants. Schools, hospitals and convalescent homes are considered to be relatively sensitive to poor air quality because children, elderly people and the infirm are more susceptible to respiratory infections and other air quality-related health problems than the general public. Residential areas are also sensitive to poor air quality because people usually stay home for extended periods of time.

The proposed project would initiate within the SPSP area, and would include the construction of the initial facilities two pump stations and a force main) and future facilities (pump station and force main) from the SPSP to the UNWI at W. Elkhorn Blvd. The area around the proposed pump

stations are currently characterized as rural with the nearest sensitive receptor located approximately 1.2 miles to the north east of the easternmost pump station. The construction of the force mains would be located within the right-of-way of county roadways and would be located within 50 feet of the nearest sensitive receptors.

3.2.3 Regulatory Setting

The project area is located in the southern portion of Sutter County, western portion of Placer County and northern portion of Sacramento County, California, where air quality is regulated by the U.S. Environmental Protection Agency (U.S. EPA), the CARB, the FRAQMD, Placer County Air Pollution Control District (PCAPCD) and SMAQMD. Each of these agencies develops rules, regulations, policies, and/or goals to comply with applicable legislation. Although U.S. EPA regulations may not be superseded, both state and local regulations may be more stringent. Applicable regulations associated with criteria air pollutants are described below.

Federal Regulations

The federal Clean Air Act (FCAA) requires the U.S. EPA to identify National Ambient Air Quality Standards (NAAQS or national standards) to protect public health and welfare. National standards have been established for ozone, CO, NO_2, SO_2, $PM_{10,}$ $PM_{2.5}$, and lead. **Table 3.2-2** shows current national and State ambient air quality standards and provides a brief discussion of the related health effects and principal sources for each pollutant.

Pursuant to the 1990 FCAA, the U.S. EPA classifies air basins (or portions thereof) as "attainment" or "nonattainment" for each criteria air pollutants, based on whether or not the NAAQS had been achieved. **Tables 3.2-3** (Sutter County), **3.2-4** (Placer County) and **3.2-5** (Sacramento County) shows the current attainment status of the proposed project area.

The FCAA requires each state to prepare an air quality control plan referred to as the State Implementation Plan (SIP). The FCAA added requirements for states containing areas that violate the NAAQS to revise their SIPs to incorporate additional control measures to reduce air pollution. The SIP is a living document that is periodically modified to reflect the latest emissions inventories, planning documents, and rules and regulations of air basins as reported by the agencies with jurisdiction over them. The U.S. EPA has responsibility to review all state SIPs to determine if they conform to the mandates of the FCAA and will achieve air quality goals when implemented. If the U.S. EPA determines a SIP to be inadequate, it may prepare a Federal Implementation Plan (FIP) for the nonattainment area and may impose additional control measures. Failure to submit an approvable SIP or to implement the plan within mandated timeframes can result in sanctions being applied to transportation funding and stationary air pollution sources in the air basin.

TABLE 3.2-2.
STATE AND NATIONAL CRITERIA AIR POLLUTANT STANDARDS, EFFECTS, AND SOURCES

Pollutant	Averaging Time	State Standard	National Standard	Pollutant Health and Atmospheric Effects	Major Pollutant Sources
Ozone	1 hour	0.09 ppm	---	High concentrations can directly affect lungs, causing irritation. Long-term exposure may cause damage to lung tissue.	Formed when reactive organic gases (ROG) and nitrogen oxides (NO_x) react in the presence of sunlight. Major sources include on-road motor vehicles, solvent evaporation, and commercial/ industrial mobile equipment.
	8 hours	0.07 ppm	0.07 ppm		
Carbon Monoxide	1 hour	20 ppm	35 ppm	Classified as a chemical asphyxiant, carbon monoxide interferes with the transfer of fresh oxygen to the blood and deprives sensitive tissues of oxygen.	Internal combustion engines, primarily gasoline-powered motor vehicles.
	8 hours	9.0 ppm	9 ppm		
Nitrogen Dioxide	1 hour	0.18 ppm	0.100 ppm	Irritating to eyes and respiratory tract. Colors atmosphere reddish-brown.	Motor vehicles, petroleum refining operations, industrial sources, aircraft, ships, and railroads.
	Annual Avg.	0.030 ppm	0.053 ppm		
Sulfur Dioxide	1 hour	0.25 ppm	---	Irritates upper respiratory tract; injurious to lung tissue. Can yellow the leaves of plants, destructive to marble, iron, and steel. Limits visibility and reduces sunlight.	Fuel combustion, chemical plants, sulfur recovery plants, and metal processing.
	3 hours	---	0.5 ppm		
	24 hours	0.04 ppm	0.14 ppm		
	Annual Avg.	---	0.03 ppm		
Respirable Particulate Matter (PM_{10})	24 hours	50 $\mu g/m^3$	150 $\mu g/m^3$	May irritate eyes and respiratory tract, decreases in lung capacity, cancer and increased mortality. Produces haze and limits visibility.	Dust and fume-producing industrial and agricultural operations, combustion, atmospheric photochemical reactions, and natural activities (e.g., wind-raised dust and ocean sprays).
	Annual Avg.	20 $\mu g/m^3$	---		
Fine Particulate Matter ($PM_{2.5}$)	24 hours	---	35 $\mu g/m^3$	Increases respiratory disease, lung damage, cancer, and premature death. Reduces visibility and results in surface soiling.	Fuel combustion in motor vehicles, equipment, and industrial sources; residential and agricultural burning; Also, formed from photochemical reactions of other pollutants, including NO_x, sulfur oxides, and organics.
	Annual Avg.	12 $\mu g/m^3$	15 $\mu g/m^3$		
Lead	**Monthly Ave.**	1.5 $\mu g/m^3$	---	Disturbs gastrointestinal system, and causes anemia, kidney disease, and neuromuscular and neurological dysfunction.	Present source: lead smelters, battery manufacturing & recycling facilities. Past source: combustion of leaded gasoline.
	Quarterly	---	1.5 $\mu g/m^3$		
Hydrogen Sulfide	**1 hour**	0.03 ppm	No National Standard	Nuisance odor (rotten egg smell), headache and breathing difficulties (higher concentrations)	Geothermal Power Plants, Petroleum Production and refining
Sulfates	**24 hour**	25 $\mu g/m^3$	No National Standard	Breathing difficulties, aggravates asthma, reduced visibility	Produced by the reaction in the air of SO_2.
Visibility Reducing Particles	**8 hour**	Extinction of 0.23/km; visibility of 10 miles or more	No National Standard	Reduces visibility, reduced airport safety, lower real estate value, discourages tourism.	See $PM_{2.5}$.

NOTES:

$\mu g/m^3$ = micrograms per cubic meter; ppm = parts per million.

SOURCES: California Air Resources Board (CARB), 2015b. *Ambient Air Quality Standards.* Available: http://www.arb.ca.gov/research/aaqs/aaqs2.pdf. Standards last updated October 1, 2015.

California Air Resources Board, 2009. *ARB Fact Sheet: Air Pollution Sources, Effects and Control.* Available: http://www.arb.ca.gov/research/health/fs/fs2/fs2.htm, page last reviewed December 2009.

TABLE 3.2-3.
SUTTER COUNTY ATTAINMENT STATUS

	Designation/Classification	
Pollutant	**Federal Standards**	**State Standards**
Ozone – one hour	No Federal Standard	Nonattainment/Transitional
Ozone – eight hour	Nonattainment/Serious	Nonattainment
PM_{10}	Unclassified	Nonattainment
$PM_{2.5}$	Nonattainment	Attainment
CO	Unclassified/Attainment	Attainment
Nitrogen Dioxide	Unclassified/Attainment	Attainment
Sulfur Dioxide	Unclassified/Attainment	Attainment
Lead	Unclassified/Attainment	Attainment
Hydrogen Sulfide	No Federal Standard	Unclassified
Sulfates	No Federal Standard	Attainment
Visibility Reducing Particles	No Federal Standard	Unclassified

SOURCES: California Air Resources Board (CARB), 2014a. *Area Designation Maps.* Available: http://www.arb.ca.gov/desig/adm/adm.htm, page updated August 22, 2014 and accessed April 12, 2016.
U.S. Environmental Protection Agency (U.S. EPA), 2015. *Criteria Pollutant Area Summary Report.* Available: https://www3.epa.gov/airquality/greenbook/, page update October 1, 2015 and accessed April 12, 2016.

TABLE 3.2-4.
PLACER COUNTY ATTAINMENT STATUS

	Designation/Classification	
Pollutant	**Federal Standards**	**State Standards**
Ozone – one hour	No Federal Standard	Nonattainment/Serious
Ozone – eight hour	Nonattainment/Serious	Nonattainment
PM_{10}	Unclassified	Nonattainment
$PM_{2.5}$	Nonattainment	Unclassified
CO	Unclassified/Attainment	Attainment
Nitrogen Dioxide	Unclassified/Attainment	Attainment
Sulfur Dioxide	Unclassified/Attainment	Attainment
Lead	Unclassified/Attainment	Attainment
Hydrogen Sulfide	No Federal Standard	Unclassified
Sulfates	No Federal Standard	Attainment
Visibility Reducing Particles	No Federal Standard	Unclassified

SOURCES: California Air Resources Board (CARB), 2014a. *Area Designation Maps.* Available: http://www.arb.ca.gov/desig/adm/adm.htm, page updated August 22, 2014 and accessed April 12, 2016.
U.S. Environmental Protection Agency (U.S. EPA), 2015. *Criteria Pollutant Area Summary Report.* Available: https://www3.epa.gov/airquality/greenbook/, page update October 1, 2015 and accessed April 12, 2016.

TABLE 3.2-5.
SACRAMENTO COUNTY ATTAINMENT STATUS

	Designation/Classification	
Pollutant	**Federal Standards**	**State Standards**
Ozone – one hour	No Federal Standard	Nonattainment/Serious
Ozone – eight hour	Nonattainment/Serious	Nonattainment
PM_{10}	Attainment	Nonattainment
$PM_{2.5}$	Nonattainment	Attainment
CO	Unclassified/Attainment	Attainment
Nitrogen Dioxide	Unclassified/Attainment	Attainment
Sulfur Dioxide	Unclassified/Attainment	Attainment
Lead	Unclassified/Attainment	Attainment
Hydrogen Sulfide	No Federal Standard	Unclassified
Sulfates	No Federal Standard	Attainment
Visibility Reducing Particles	No Federal Standard	Unclassified

SOURCES: California Air Resources Board (CARB), 2014a. *Area Designation Maps.* Available: http://www.arb.ca.gov/desig/adm/adm.htm, page updated August 22, 2014 and accessed April 12, 2016.
U.S. Environmental Protection Agency (U.S. EPA), 2015. *Criteria Pollutant Area Summary Report.* Available: https://www3.epa.gov/airquality/greenbook/, page updated October 1, 2015 and accessed April 12, 2016.

Greenhouse Gases

U.S. Environmental Protection Agency "Endangerment" and "Cause or Contribute" Findings

The U.S. Supreme Court held that the United States Environmental Protection Agency (U.S. EPA) must consider regulation of motor vehicle GHG emissions. In *Massachusetts v. Environmental Protection Agency* et al., twelve states and cities, including California, together with several environmental organizations sued to require the U.S. EPA to regulate GHGs as pollutants under the CAA (127 S. Ct. 1438 (2007)). The Supreme Court ruled that GHGs fit within the CAA's definition of a pollutant and the U.S. EPA had the authority to regulate GHGs.

On December 7, 2009, the U.S. EPA Administrator signed two distinct findings regarding GHGs under Section 202(a) of the CAA:

- ***Endangerment Finding:*** The current and projected concentrations of the six key GHGs—CO_2, CH_4, N_2O, HFCs, PFCs, and SF_6—in the atmosphere threaten the public health and welfare of current and future generations.

- ***Cause or Contribute Finding:*** The combined emissions of these GHGs from new motor vehicles and new motor vehicle engines contribute to the GHG pollution that threatens public health and welfare.

Mandatory Greenhouse Gas Reporting Rule

On September 22, 2009, the U.S. EPA released its final Greenhouse Gas Reporting Rule (Reporting Rule). The Reporting Rule is a response to the fiscal year (FY) 2008 Consolidated Appropriations Act (H.R. 2764; Public Law 110-161), that required the U.S. EPA to develop "…mandatory reporting of GHGs above appropriate thresholds in all sectors of the economy…." The Reporting Rule will apply to most entities that emit 25,000 metric tons of CO_2e or more per year. Starting in 2010, facility owners are required to submit an annual GHG emissions report with detailed calculations of facility GHG emissions. The Reporting Rule also mandates recordkeeping and administrative requirements in order for the U.S. EPA to verify annual GHG emissions reports.

State Regulations

The CARB manages air quality, regulates mobile emissions sources, and oversees the activities of county Air Pollution Control Districts and regional Air Quality Management Districts. CARB establishes state ambient air quality standards and vehicle emissions standards.

California has adopted ambient standards that are typically more stringent than the federal standards for the criteria air pollutants. These are shown in Table 3.2-2. Under the California Clean Air Act (CCAA) patterned after the FCAA, areas have been designated as attainment or nonattainment with respect to the state standards. Tables 3.2-3 through 3.2-5 summarize the attainment status with California standards in the proposed project area.

Greenhouse Gases

Various statewide and local initiatives to reduce California's contribution to GHG emissions have raised awareness that even though the various contributors to and consequences of global climate change are not yet fully understood, global climate change is occurring, and that there is a real potential for severe adverse environmental, social, and economic effects in the long term. Every nation emits GHGs and therefore makes an incremental cumulative contribution to global climate change; therefore, global cooperation will be required to reduce the rate of GHG emissions enough to slow or stop the human-caused increase in average global temperatures and associated changes in climatic conditions.

Assembly Bill 1493

In 2002, then-Governor Gray Davis signed Assembly Bill (AB) 1493, which required the CARB to develop and adopt, by January 1, 2005, regulations that achieve "the maximum feasible reduction of GHGs emitted by passenger vehicles and light-duty trucks and other vehicles determined by the CARB to be vehicles whose primary use is noncommercial personal transportation in the state."

To meet the requirements of AB 1493, the CARB approved amendments to the California Code of Regulations (CCR) in 2004, adding GHG emissions standards to California's existing standards for motor vehicle emissions. Amendments to CCR Title 13, Sections 1900 and 1961

(13 CCR 1900, 1961), and adoption of Section 1961.1 (13 CCR 1961.1), require automobile manufacturers to meet fleet-average GHG emissions limits for all passenger cars, light-duty trucks within various weight criteria, and medium-duty passenger vehicle weight classes (i.e., any medium-duty vehicle with a gross vehicle weight [GVW] rating of less than 10,000 pounds and that is designed primarily for the transportation of persons), beginning with model year 2009. For passenger cars and light-duty trucks with a loaded vehicle weight (LVW) of 3,750 pounds or less, the GHG emission limits for model year 2016 are approximately 37 percent lower than the limits for the first year of the regulations, model year 2009. For light-duty trucks with an LVW of 3,751 pounds to a GVW of 8,500 pounds, as well as for medium-duty passenger vehicles, GHG emissions will be reduced approximately 24 percent between 2009 and 2016.

Because the Pavley standards (named for the bill's author, state Senator Fran Pavley) would impose stricter standards than those under the CAA, California applied to the U.S. EPA for a waiver under the CAA; this waiver was initially denied in 2008. In 2009, however, the U.S. EPA granted the waiver.

Executive Order S-3-05

Executive Order S-3-05, which was signed by Governor Schwarzenegger in 2005, proclaims that California is vulnerable to the impacts of climate change. It declares that increased temperatures could reduce the snowpack in the Sierra Nevada, exacerbate California's air quality problems, and potentially cause a rise in sea level. To address those concerns, the executive order established total GHG emission targets. Specifically, emissions must be reduced to the 2000 level by 2010, to the 1990 level by 2020, and to 80% below the 1990 level by 2050.

The executive order directed the secretary of the California Environmental Protection Agency (Cal/EPA) to coordinate a multiagency effort to reduce GHG emissions to the target levels. The secretary will also submit biannual reports to the governor and California Legislature describing the progress made toward the emissions targets, the impacts of global climate change on California's resources, and mitigation and adaptation plans to combat these impacts. To comply with the executive order, the secretary of Cal/EPA created the California Climate Action Team, made up of members from various state agencies and commissions. The team released its first report in March 2006. The report proposed to achieve the targets by building on the voluntary actions of California businesses, local governments, and communities and through state incentive and regulatory programs.

Assembly Bill 32 and the California Climate Change Scoping Plan

Assembly Bill 32 Requirements

In 2006, the California legislature passed Assembly Bill 32 (California Health and Safety Code Division 25.5, Sections 38500, et seq., or AB 32), also known as the Global Warming Solutions Act. AB 32 requires the CARB to design and implement feasible and cost-effective emissions limits, regulations, and other measures, such that statewide GHG emissions are reduced to 1990 levels by 2020 (representing a 25-percent reduction in emissions). AB 32 anticipates that the

GHG reduction goals will be met, in part, through local government actions. The CARB has identified a GHG reduction target of 15 percent from current levels for local governments (municipal and community-wide) and notes that successful implementation of the plan relies on local governments' land use planning and urban growth decisions because local governments have primary authority to plan, zone, approve, and permit land development to accommodate population growth and the changing needs of their jurisdictions.

Scoping Plan Provisions

Pursuant to AB 32, the CARB adopted a *Climate Change Scoping Plan* in December 2008 (re-approved by the CARB on August 24, 2011) outlining measures to meet the 2020 GHG reduction goals. The Scoping Plan recommends measures that are worth studying further, and that the State of California may implement, such as new fuel regulations. It estimates that a reduction of 174 million metric tons of CO_2e (about 191 million U.S. tons) from the transportation, energy, agriculture, forestry, and other sources could be achieved should the state implement all of the measures in the Scoping Plan. The Scoping Plan relies on the requirements of Senate Bill (SB) 375 (discussed below) to implement the carbon emission reductions anticipated from land use decisions.

The First Update to the Climate Change Scoping Plan (CARB, 2014b) describes progress made to meet near-term emissions goals of AB 32, defines California's climate change priorities and activities for the next few years, and describes the issues facing the State as it establishes a framework for achieving air quality and climate goals beyond the year 2020. In regard to achieving the 2050 GHG reduction goal, "progressing toward California's long-term climate goals will require that GHG reduction rates be significantly accelerated. Emissions from 2020 to 2050 will have to decline at more than twice the rate of that which is needed to reach the 2020 statewide emissions limit."

California Climate Action Registry

The CCAR was established in 2001 by SB 1771 and SB 527 (Chapter 1018, Statutes of 2000, and Chapter 769, Statutes of 2001, respectively) as a nonprofit voluntary registry for GHG emissions. The purpose of the CCAR is to help companies and organizations with operations in the state to establish GHG emissions baselines against which any future GHG emissions reduction requirements may be applied. CCAR has developed a general protocol (CCAR, 2009) and additional industry-specific protocols that provide guidance on how to inventory GHG emissions for participation in the registry.

Cap-and-Trade Program

The Scoping Plan identifies cap-and-trade as a key strategy for helping California reduce its GHG emissions (CARB, 2008). A cap-and-trade program sets the total amount of greenhouse gas emissions allowable for facilities under the cap and allows covered sources, including producers and consumers of energy, to determine the least expensive strategies to comply. AB 32 required the CARB to adopt the cap-and-trade regulation by January 1, 2011, and the program itself began in November 2012.

Carbon offset credits are created through the development of projects, such as renewable energy generation or carbon sequestration projects, that achieve the reduction of emissions from activities not otherwise regulated, covered under an emissions cap, or resulting from government incentives. Offsets are verified reductions of emissions whose ownership can be transferred to others. As required by AB 32, any reduction of GHG emissions used for compliance purposes must be real, permanent, quantifiable, verifiable, enforceable, and additional. Offsets used to meet regulatory requirements must be quantified according to the CARB-adopted methodologies, and the CARB must adopt a regulation to verify and enforce the reductions. The criteria developed will ensure that the reductions are quantified accurately and are not double-counted within the system (CARB, 2008).

Senate Bill 1368

SB 1368 (Chapter 598, Statutes of 2006) is the companion bill of AB 32 and was signed by Governor Schwarzenegger in September 2006. SB 1368 required the CPUC to establish a performance standard for baseload generation of GHG emissions by investor-owned utilities by February 1, 2007. SB 1368 also required California Energy Commission (CEC) to establish a similar standard for local publicly owned utilities by June 30, 2007. These standards could not exceed the GHG emissions rate from a baseload combined-cycle natural gas–fired plant. Furthermore, the legislation states that all electricity provided to California, including imported electricity, must be generated by plants that meet the standards set by CPUC and CEC.

Executive Order S-1-07

Executive Order S-1-07, which was signed by Governor Schwarzenegger in 2007, proclaims that the transportation sector is the main source of GHG emissions in California, generating more than 40% of statewide emissions. It establishes a goal to reduce the carbon intensity of transportation fuels sold in California by at least 10% by 2020. This order also directs CARB to determine whether this Low Carbon Fuel Standard could be adopted as a discrete early-action measure as part of the effort to meet the mandates in AB 32.

Senate Bill 97

SB 97, signed August 2007 (Chapter 185, Statutes of 2007; Public Resources Code Sections 21083.05 and 21097), acknowledges that climate change is a prominent environmental issue that requires analysis under CEQA. This bill directs the Governor's Office of Planning and Research (OPR), which is part of the state Resources Agency, to prepare, develop, and transmit to CARB guidelines for the feasible mitigation of GHG emissions (or the effects of GHG emissions), as required by CEQA, by July 1, 2009. On December 31, 2009, the Natural Resources Agency delivered its rulemaking package to the Office of Administrative Law for their review pursuant to the Administrative Procedure Act. The adopted guidelines became effective on March 18, 2010.

Senate Bills 1078 and 107 and Executive Order S-14-08

SB 1078 (Chapter 516, Statutes of 2002) requires retail sellers of electricity, including investor-owned utilities and community choice aggregators, to provide at least 20% of their supply from renewable sources by 2017. SB 107 (Chapter 464, Statutes of 2006) changed the target date to

2010. In November 2008 Governor Schwarzenegger signed Executive Order S-14-08, which expands the state's Renewable Energy Standard to 33% renewable power by 2020.

Senate Bill 375

SB 375, signed in September 2008, aligns regional transportation planning efforts, regional GHG reduction targets, and land use and housing allocation. SB 375 requires metropolitan planning organizations (MPOs) to adopt a sustainable communities strategy (SCS) or alternative planning strategy (APS) that will prescribe land use allocation in that MPOs regional transportation plan. CARB, in consultation with MPOs, will provide each affected region with reduction targets for GHGs emitted by passenger cars and light trucks in the region for the years 2020 and 2035. These reduction targets will be updated every 8 years but can be updated every 4 years if advancements in emissions technologies affect the reduction strategies to achieve the targets. CARB is also charged with reviewing each MPO's SCS or APS for consistency with its assigned targets. If MPOs do not meet the GHG reduction targets, transportation projects will not be eligible for funding programmed after January 1, 2012.

This law also extends the minimum time period for the regional housing needs allocation cycle from 5 years to 8 years for local governments located within an MPO that meets certain requirements. City or county land use policies (including general plans) are not required to be consistent with regional transportation plans (and associated SCS or APS). However, new provisions of CEQA would incentivize (through streamlining and other provisions) qualified projects that are consistent with an approved SCS or APS, categorized as "transit priority projects."

Attributing Greenhouse Gas Emissions and Land Use Linkages

Land use decisions and development projects are not recorded as an independent emissions sector in the state's GHG inventory. Rather, land use development projects draw from multiple emissions sectors (e.g., transportation, electricity, and waste). In other words, direct and indirect GHG emissions that are generated on-site or off-site, respectively, can be attributed to the operation of a land use development project. The people who would reside in and the visitors to a development would drive vehicles and generate GHGs that are accounted for in the transportation sector. Electricity consumed at buildings within a project site would indirectly cause GHGs to be emitted at a utility provider. These stationary-source GHG emissions associated with the operation of the utility would be closely controlled and regulated under AB 32 and SB 1368.

Transportation-related GHG emissions are a function of two parameters: emissions control technology and vehicle miles traveled (VMT). AB 1493 and Executive Order S-1-07 address emissions control technology, but not VMT. Since 1990, VMT per capita in California has been increasing at a faster rate than the state's population. Consequently, GHG emissions from increased VMT have outpaced the emissions reductions associated with improved vehicle emissions controls. SB 375, through its linkages of land use and transportation funding, addresses the need and provides incentive for VMT reductions.

California Air Pollution Control Officers Association

In January 2008, the California Air Pollution Control Officers Association (CAPCOA) issued a "white paper" on evaluating and addressing GHGs under CEQA (CAPCOA, 2008). This resource guide was prepared to support local governments as they develop their programs and policies around climate change issues. The paper is not a guidance document. It is not intended to dictate or direct how any agency chooses to address GHG emissions. Rather, it is intended to provide a common platform of information about key elements of CEQA as they pertain to GHG, including an analysis of different approaches to setting significance thresholds.

The paper notes that for a variety of reasons local agencies may decide not to have a CEQA threshold. Local agencies may also decide to assess projects on a case-by-case basis when the projects come forward. The paper also discusses a range of GHG emission thresholds that could be used. The range of thresholds discussed includes a GHG threshold of zero and several non-zero thresholds. Non-zero thresholds include percentage reductions for new projects that would allow the state to meet its goals for GHG emissions reductions by 2020 and perhaps 2050. These would be determined by a comparison of new emissions versus business as usual emissions and the reductions required would be approximately 30 percent to achieve 2020 goals and 90 percent (effectively immediately) to achieve the more aggressive 2050 goals. These goals could be varied to apply differently to a new project, by economic sector, or by region in the state.

Other non-zero thresholds discussed in the paper include:

- 900 metric tons/year CO_2e (a market capture approach);
- 10,000 metric tons/year CO_2e (potential CARB mandatory reporting level with Cap and Trade);
- 25,000 metric tons/year CO_2e (the CARB mandatory reporting level for the statewide emissions inventory);
- 40,000 to 50,000 metric tons/year CO_2e (regulated emissions inventory capture – using percentages equivalent to those used in air districts for criteria air pollutants);
- Projects of statewide importance (9,000 metric tons/year CO_2e for residential, 13,000 metric tons/year CO_2e for office project, and 41,000 metric tons/year CO_2e for retail projects); and
- Unit-based thresholds and efficiency-based thresholds that were not quantified in the report.

Regional and Local Plans, Policies, Regulations, and Ordinances

Feather River Air Quality Management District

FRAQMD attains and maintains air quality conditions in all of Sutter County through a comprehensive program of planning, regulation, enforcement, technical innovation, and promotion of the understanding of air quality issues. The clean-air strategy of FRAQMD includes

the preparation of plans and programs for the attainment of ambient air-quality standards, adoption and enforcement of rules and regulations concerning sources of air pollution, and issuance of permits for stationary sources of air pollution. FRAQMD also inspects stationary sources of air pollution, responds to citizen complaints, monitors ambient air quality and meteorological conditions, and implements programs and regulations required by the FCAA, FCAA, and CCAA. Air quality plans applicable to the proposed project are discussed below.

Air Quality Plans

FRAQMD, in coordination with other nearby air quality management and air pollution control districts (e.g., PCAPCD and SMAQMD), prepared and submitted the 1991 Air Quality Attainment Plan (AQAP) in compliance with the requirements set forth in the CCAA, which specifically addressed the nonattainment status for ozone and, to a lesser extent, CO and PM_{10}.

The CCAA also requires a triennial assessment of the extent of air quality improvements and emission reductions achieved through the use of control measures. As part of the assessment, the attainment plan must be reviewed and, if necessary, revised to correct for deficiencies in progress and to incorporate new data or projections. The requirement of the CCAA for a first triennial progress report and revision of the 1991 AQAP was fulfilled with the preparation and adoption of the 1994 Ozone Attainment Plan (OAP). The OAP stresses attainment of ozone standards and focuses on strategies for reducing the ozone precursors ROG and NO_x. It promotes active public involvement, enforcement of FRAQMD rules and regulations, public education in both the public and private sectors, development and promotion of transportation and land use programs designed to reduce VMT in the region, and implementation of control measures for stationary and mobile sources. The OAP became part of the SIP in accordance with the requirements of the FCAA and amended the 1991 AQAP. However, at that time, the region could not show that the national ozone (1-hour) standard would be met by 1999. In exchange for moving the deadline to 2005, the region accepted a designation of "severe nonattainment" coupled with additional emissions requirements on stationary sources. Additional triennial reports were also prepared in 1997, 2000, 2003, 2006, 2009, 2012 and 2015 in compliance with the CCAA and act as incremental updates (FRAQMD, 2016).

The southern portion of Sutter County is also part of the Sacramento Federal Ozone Nonattainment Area (SFNA), which comprises all of Sacramento and Yolo Counties and portions of El Dorado, Placer, and Solano Counties.

As a nonattainment area, the region is also required to submit rate-of-progress milestone evaluations in accordance with the FCAA. Milestone reports were prepared for 1996, 1999, 2002, 2006, 2010 and most recently in 2012 for the 8-hour ozone standard. These milestone reports include compliance demonstrations that the requirements have been met for the SFNA. The AQAPs and reports present comprehensive strategies to reduce emissions of ROG, NOx, and PM_{10} from stationary, area, mobile, and indirect sources. Such strategies include the adoption of rules and regulations; enhancement of CEQA participation; implementation of a new and modified indirect-source review program; adoption of local air quality plans; and control

measures for stationary, mobile, and indirect sources. However, since the EPA revoked the standard in 2015 (Federal Register Volume 80, Issue 44), subsequent milestone reports are no longer required.

The Sacramento region was classified by EPA on June 15, 2004, as a "serious" nonattainment area for the national 8-hour ozone standard with an attainment deadline of June 15, 2013. Since the Sacramento region needs to rely on the longer term emission reduction strategies from state and federal mobile source control programs, the 2013 attainment date cannot be met. Consequently, on February 14, 2008, CARB, on behalf of the air districts in the Sacramento region, submitted a letter to EPA requesting a voluntary reclassification (bump-up) of the Sacramento Federal Nonattainment Area from a "serious" to a "severe" 8-hour ozone nonattainment area with an extended attainment deadline of June 15, 2019, and additional mandatory requirements. On May 5, 2010 EPA approved the request effective June 4, 2010.

FRAQMD Rules and Regulations

As mentioned above, FRAQMD adopts rules and regulations. All projects are subject to FRAQMD rules and regulations in effect at the time of construction. Specific rules applicable to the proposed project may include, but are not limited to:

- Rule 3.0—Visible Emissions: As provided by Section 41701 of the California Health and Safety Code, a person shall not discharge into the atmosphere from any single source of emissions whatsoever, any air contaminants for a period or periods aggregating more than three minutes in any one hour which is:
  - As dark or darker in shade as that designated as No. 2 on the Ringlemen Chart, as published by the United States Bureau of Mines; or
  - Of such opacity as to obscure an observers view to a degree equal to or greater than does smoke described above.
- Rule 3.15—Architectural Coatings: The purpose of this rule is to limit the quantity of volatile organic compounds (VOCs) in architectural coatings supplied, sold, offered for sale, applied, solicited for application, or manufactured for use.
- Rule 3.16—Fugitive Dust Emissions: The purpose of this rule is to reasonably regulate operations which periodically may cause fugitive dust emissions into the atmosphere. A person shall take every reasonable precaution not to cause or allow the emissions of fugitive dust from being airborne beyond the property line, from which the emission originates, from any construction, handling or storage activity, or any wrecking, excavation, grading, clearing of land or solid waste disposal operation. Reasonable precautions shall include, but are not limited to:
  - Use, where possible, of water or chemicals for control of dust in the demolition of existing buildings or structures, construction operations, construction of roadways, or the clearing of land;

- Application of asphalt, oil, water, or suitable chemical on dirt roads, material stockpiles, and other surfaces which can give rise to airborne dusts; and

- Other means approved by the air pollution control officer (APCO).

- Rule 4—General Requirements:

  - No person shall cause or permit the construction or modification of any source without first obtaining, as required by regulations, an Authority to Construct or modify from the APCO so as to comply with applicable rules and regulations and ambient air quality standards.

  - The APCO shall not approve such construction or modification unless the applicant demonstrates, to the satisfaction of the APCO, that the new or modified source can be expected to comply with all applicable regulations and will not prevent the attainment or maintenance of air quality standards.

- Rule 10.1—New Source Review: The purpose of this rule is

  - To establish preconstruction review requirements including offsets, best available control technology (BACT) and analysis of air quality impacts for new and modified stationary sources and to insure that the operation of such sources does not interfere with the attainment or maintenance of ambient air quality standards.

  - To provide for no net increase in emissions pursuant to Section 40918 and 40920 of the California Health and Safety Code.

Sacramento Metropolitan Air Quality Management District

The SMAQMD is the regional agency responsible for air quality regulation within the SVAB. The SMAQMD regulates air quality through its planning and review activities and has permit authority over most types of stationary emission sources and can require operators of stationary sources to obtain permits, can impose emission limits, set fuel or material specifications, and establish operational limits to reduce air emissions. The SMAQMD regulates new or modified stationary sources of TACs.

For state air quality planning purposes, Sacramento County is classified as a severe non-attainment area for ozone. The "severe" classification triggers various plan submittal requirements and transportation performance standards. In order to demonstrate the district's ability to eventually meet the federal ozone standards, the SMAQMD, along with the other air districts in the nonattainment area, maintain the region's portion of the SIP for ozone. The Sacramento Air Basin's part of the SIP is a compilation of regulations that govern how the region and State will comply with the FCAA requirements to attain and maintain the federal ozone standard. The compilation of rules that comprises the Sacramento Nonattainment Area's portion of the SIP is contained in the Sacramento Area Regional Ozone Attainment Plan. Prior to the certification of the 2007 RSP EIR, the latest update SIP was adopted by the SMAQMD on January 26, 2006. Since then, the SMAQMD has made numerous SIP revisions. Of the latest

revisions made to the SIP includes the *Sacramento Regional 8-Hour Ozone Attainment and Reasonable Further Progress Plan (2013 SIP Revisions)*, which addresses attainment of the federal 8-hour ozone standard, as well as the *2009 Triennial Report and Plan Revision*, which addresses attainment of the state ozone standard, are the latest plans issued by the SMAQMD.

These attainment plans depend heavily on the SMAQMD's permit authority, which is exercised through SMAQMD's rules and regulations. With respect to the construction phase of the proposed project, the applicable SMAQMD regulations would relate to construction and stationary equipment, particulate matter generation, architectural coatings, and paving materials. Equipment used during proposed project construction would be subject to the requirements of SMAQMD Regulation 2 (Permits), Rule 201 (General Permit Requirements); Regulation 4 (Prohibitory Rules), Rule 401 (Ringelmann Chart/Opacity), Rule 402 (Nuisance), Rule 403 (Fugitive Dust), Rule 404 (Particulate Matter), Rule 405 (Dust and Condensed Fumes), Rule 411 (Boiler NOx), Rule 420 (Sulfur Content of Fuels), Rule 442 (Architectural Coatings), and Rule 453 (Cutback and Emulsified Asphalt Paving Materials).

Placer County Air Pollution Control District

The PCAPCD is the regional agency responsible for air quality regulation within Placer County. The PCAPCD regulates air quality through its planning and review activities and has permit authority over most types of stationary emission sources and can require stationary sources to obtain permits, and can impose emission limits, set fuel or material specifications, or establish operational limits to reduce air emissions. The PCAPCD regulates new or expanding stationary sources of TACs.

Ozone Attainment Plan

For state air quality planning purposes, western Placer County is classified as a severe non-attainment area for ozone. The "severe" classification triggers various plan submittal requirements and transportation performance standards. One such requirement is that the PCAPCD update the Clean Air Plan every three years to reflect progress in meeting the air quality standards and to incorporate new information regarding the feasibility of control measures and new emission inventory data. The PCAPCD's record of progress in implementing previous measures must also be reviewed. The *2013 SIP Revisions* (CARB, 2013), which addresses attainment of the federal 8-hour ozone standard, as well as the *2012 Triennial Progress Report,* which addresses attainment of the state ozone standard, are the latest plans issued by the PCAPCD. The 2012 Triennial Progress Report, like the Ozone Attainment Plan, includes a current emission inventory and projected future inventories of ROG and NOx emissions in Placer County. The future inventories reflect future growth rates of population, travel, employment, industrial/commercial activities, and energy use, as well as controls imposed through local, state, and federal emission reduction measures. The 2012 Triennial Progress Report, like the triennial progress reports prepared in previous years, discusses rules that the PCAPCD has adopted during the previous three years, incentive programs that have been implemented and other measures that

would supplement those in the Ozone Attainment Plan to achieve the required 5% per year reduction required by the CCAA.

PCAPCD Rules and Regulations

Appendices B and D of the PCAPCD *CEQA Air Quality Handbook* include an all-inclusive list of rules and regulations required for all projects. Each lead agency is responsible for compliance with the rules and regulations, whether requiring implementation through mitigation, conditions of approval, or standard notes on improvement plans, grading plans, or design review permits.

A general summary of the key PCAPCD rules and regulations is presented below.

Rule 217 – Cutback and Emulsified Asphalt Paving Materials: Rule 217 limits the volatile organic compounds (VOCs) content of asphalt paving materials used in the district.

Rule 225 – Wood-Burning Appliances: Rule 225 establishes limits on the rate of particulate matter emissions from operation of a wood-burning appliance.

Rule 228 – Fugitive Dust: Rule 228 is intended to reduce the amount of particulate matter entrained in the ambient air, or discharged into the ambient air, as a result of anthropogenic (man-made) fugitive dust sources by requiring actions to prevent, reduce, or mitigate fugitive dust emissions. The provisions of Rule 228 apply to any activity or man-made condition capable of generating fugitive dust within Placer County.

Regulation 3 – Open Burning: Regulation 3 includes Rules 301 through 306 related to smoke management for various land uses including agricultural uses, residential uses, and disposal sites. Regulation 3 is intended to reduce emissions of TACs from smoke from allowed outdoor burning.

Rule 501 – General Permit Requirements: Rule 501 provides an orderly procedure for the review of new sources of air pollution, and modification and operation of existing sources, through the issuance of permits.

Sutter County

The following goals and policies from the Sutter County General Plan (Sutter County, 2011) related to air quality are applicable to the proposed project:

Goal ER 9: Protect, maintain, and improve the air quality in Sutter County.

- **Policy ER 9.1: Ambient Air Quality Standards.** Work with the California Air Resources Board and the Feather River Air Quality Management District (FRAQMD) to meet state and federal ambient air quality standards.
- **Policy ER 9.5: FRAQMD Review.** Submit development proposals to FRAQMD for review and comment in accordance with CEQA prior to consideration by the County's decision-making body.

- **Policy ER 9.9: Odors.** Require, for uses other than permitted agricultural operations, that adequate buffer distances be provided between odor sources and sensitive receptors.

- **Policy ER 9.10: Contractor Preference.** Give preference to contractors that use low-emission equipment and other practices with air quality benefits for County-sponsored construction projects, and to businesses that practice sustainable operations.

- **Policy ER 9.11: County Fleet.** Purchase low-emission vehicles for the County's fleet and use clean fuel sources for trucks and heavy equipment, when feasible.

Sacramento County

The following goals and policies from the Sacramento County General Plan (Sacramento County, 2011) related to air quality are applicable to the proposed project:

Goal: Improve air quality to promote the public health, safety, welfare, and environmental quality of the community.

- **Policy AQ-1:** New development shall be designed to promote pedestrian/bicycle access and circulation to encourage community residents to use alternative modes of transportation to conserve air quality and minimize direct and indirect emission of air contaminants.

- **Policy AQ-3:** Buffers and/or other appropriate mitigation shall be established on a project-by-project basis and incorporated during review to provide for protection of sensitive receptors from sources of air pollution or odor. The California Air Resources Board's "Air Quality and Land Use Handbook: A Community Health Perspective", and the AQMD's approved Protocol (Protocol for Evaluating the Location of Sensitive Land uses Adjacent to Major Roadways) shall be utilized when establishing these buffers.

- **Policy AQ-11:** Encourage contractors operating in the county to procure and to operate low-emission vehicles, and to seek low emission fleet status for their off-road equipment.

- **Policy AQ-16:** Prohibit the idling of on-and off-road engines when the vehicle is not moving or when the off-road equipment is not performing work for a period of time greater than five minutes in any one-hour period.

Placer County

The following goals and policies from the Placer County General Plan (Placer County, 2013) related to air quality are applicable to the proposed project:

Goal 6.F: To protect and improve air quality in Placer County

- **Policy 6.F.1:** The County shall cooperate with other agencies to develop a consistent and effective approach to air quality planning and management.

- **Policy 6.F.2:** The County shall develop mitigation measures to minimize stationary source and area source emissions.

- **Policy 6.F.3:** The County shall support the Placer County Air Pollution Control District (PCAPCD) in its development of improved ambient air quality monitoring capabilities and the establishment of standards, thresholds, and rules to more adequately address the air quality impacts of new development.

- **Policy 6.F.4:** The County shall solicit and consider comments from local and regional agencies on proposed projects that may affect regional air quality.

- **Policy 6.F.6:** The County shall require project-level environmental review to include identification of potential air quality impacts and designation of design and other appropriate mitigation measures or offset fees to reduce impacts. The County shall dedicate staff to work with project proponents and other agencies in identifying, ensuring the implementation of, and monitoring the success of mitigation measures.

- **Policy 6.F.7:** The County shall encourage development to be located and designed to minimize direct and indirect air pollutants.

- **Policy 6.F.8:** The County shall submit development proposals to the PCAPCD for review and comment in compliance with CEQA prior to consideration by the appropriate decision-making body.

- **Policy 6.F.9:** In reviewing project applications, the County shall consider alternatives or amendments that reduce emissions of air pollutants.

- **Policy 6.F.10:** The County may require new development projects to submit an air quality analysis for review and approval. Based on this analysis, the County shall require appropriate mitigation measures consistent with the PCAPCD's 1991 Air Quality Attainment Plan (or updated edition).

- **Policy 6.F.11:** The County shall apply the buffer standards described in Part 1 of this Policy Document and meteorological analyses to provide separation between possible emission/nuisance sources (such as industrial and commercial uses) and residential uses.

3.2.4 Impacts and Mitigation Measures

Significance Criteria

According to Appendix G of the CEQA *Guidelines*, a project would have a significant effect on air quality if it would:

- Conflict with or obstruct implementation of the applicable air quality plan;

- Violate any air quality standard or contribute substantially to an existing or projected air quality violation;

- Result in a cumulatively considerable net increase of any nonattainment pollutant (including releasing emissions that exceed quantitative thresholds for ozone precursors);

- Expose sensitive receptors to substantial pollutant concentrations;

- Create objectionable odors affecting a substantial number of people;

- Generate GHG emissions, either directly or indirectly, that may have a significant impact on the environment; or
- Conflict with an applicable plan, policy, or regulation adopted for the purpose of reducing the emissions of GHG.

Criteria Pollutants

Construction

Since the installation of the force main would occur within the jurisdictions of multiple air districts (i.e., FRAQMD, PCAPCD and SMAQMD), the construction emissions generated during the construction of the force main are compared to each air districts significance thresholds, which are provided in **Table 3.2-6**, expressed in maximum pounds per day (ppd) and tons per year (tpy). Criteria pollutant emissions generated during the construction of the pump stations are compared to the FRAQMD significance thresholds.

TABLE 3.2-6.
AIR DISTRICT CONSTRUCTION THRESHOLDS OF SIGNIFICANCE FOR PROPOSED PROJECT ACTIVITIES[1]

Air District	ROG	NOx	PM_{10}	$PM_{2.5}$
Feather River AQMD	25 ppd multiplied by project length, not to exceed 4.5 tpy	25 ppd multiplied by project length, not to exceed 4.5 tpy	80 ppd	--
Placer County APCD	82 ppd	82 ppd	82 ppd	--
Sacramento Metropolitan AQMD	--	85 ppd	80 ppd/14.6 tpy	82 ppd/15 tpy

NOTES:
ppd = pounds per day; tpy = tons per year

SOURCES: Feather River AQMD, 2016; Placer County APCD, 2012; Sacramento Metropolitan AQMD, 2009.

Operation

Since the pump stations are located within the jurisdiction of the FRAQMD, the emissions generated during the maintenance of the emergency backup generators are compared to the FRAQMD operational significance thresholds, which are provided in **Table 3.2-7**.

TABLE 3.2-7.
FRAQMD OPERATIONAL THRESHOLDS OF SIGNIFICANCE

Air District	ROG	NO_x	PM_{10}
Feather River AQMD	25 ppd	25 ppd	80 ppd

NOTES:
ppd = Pounds per Day; tpy = Tons per Year

SOURCE: Feather River AQMD, 2016; Placer County APCD, 2012; Sacramento Metropolitan AQMD, 2009.

Climate Change Thresholds of Significance

To date, the FRAQMD or PCAPCD has not adopted a significance GHG threshold. Therefore, for this analysis, the application of the SMAQMD adopted GHG significance thresholds found in the SMAQMD's *CEQA Guide to Air Quality Assessment* (SMAQMD, 2009a) would be used to assess impacts related to climate change. SMAQMD's recommended threshold of significance for construction, operational and stationary source GHG emissions are:

- Construction phase of projects – 1,100 metric tons of CO_2e per year.
- Operational phase of a land development project – 1,100 metric tons of CO_2e per year.
- Operational phase of stationary source projects – 10,000 metric tons of CO_2e per year.

Methodology

The proposed project would result in the construction of two pump stations, an odor control facility (if required) and the installation of a force main that would expand from the SPSP area to the UNWI at W. Elkhorn Blvd., approximately nine miles in length. Installation of the initial pump stations, odor control facility, and force main would be anticipated to begin in spring 2017 and would be completed by late fall 2017, with a duration of approximately three to four months for construction of the force mains and odor control facility and up to six to eight months for construction of the pump stations. Construction activities for the future facilities would occur at some point before development of additional areas within the SPSP with similar duration for completion of construction activities as the initial facilities. Construction activities would be short-term and intermittent and result in emissions of criteria air pollutants and GHGs, which were assessed in accordance with methodologies recommended by CARB and local air districts. Criteria pollutant and GHG Emissions were modeled using the California Emissions Estimator Model (CalEEMod) (version 2013.2.2) software with project-specific data (e.g., construction equipment types and number requirements, maximum daily acreage disturbed) provided by the applicant.

Operational criteria pollutant emissions associated with the project were estimated using emission factors found in EPA's *AP 42 Compilation of Air Pollutant Emission Facts* (EPA, 2009) for the diesel emergency generators to be located at each of the three pump stations. The three diesel emergency generators were assumed to have a power output of 500 kW, load factor of 70% and operate at most 2 hours during maintenance. The diesel emergency generator would comply with all measures required by the Statewide Portable Equipment Registration Program (PERP). Detailed modeling results are presented in Appendix D.

The indirect operational GHG emissions from pump stations 1 and 2 were estimated using GHG intensity factors provided by the Pacific Gas and Electric Company (PG&E, 2015). PG&E would provide power to the two electric underground pump stations. The power consumption of pump stations 1 and 2 were assumed to be 624 and 3,480 kwh per day, respectively. The combined GHG emissions from the two pumps were calculated and compared to the SMAQMD's

significance threshold for stationary sources. Detailed modeling results are presented in Appendix D.

The indirect operational GHG emissions from the odor control facility were estimated using GHG intensity factors provided by the Sacramento Municipal Utility District (SMUD, 2012). SMUD would provide power to the proposed odor control facility. The power consumption of the proposed odor control facility is assumed to be 500 kwh per day. The GHG emissions from the odor control facility were calculated and compared to the SMAQMD's significance threshold for stationary sources. Detailed modeling results are presented in Appendix D.

Impacts Adequately Analyzed in the SPSP EIR or not Applicable to the Project

As determined in the Environmental Checklist prepared for the proposed project, impacts relating to conflicts or obstruction with applicable air quality plans, or exposure of sensitive receptors to substantial pollutant concentrations or objectionable odors, were determined to have no impact or be less than significant and were not evaluated in this section of the Focused Tiered EIR (see the Environmental Checklist in Appendix B).

Proposed Project Impacts and Mitigation Measures

Table 3.2-8 provides a summary of the impacts identified for the proposed project. The level of significance after any mitigation measures is also presented. Each of these impacts is discussed in more detail below.

TABLE 3.2-8.
PROPOSED PROJECT IMPACT SUMMARY – AIR QUALITY

	Initial Facilities		Future Facilities	
Impact	**Before Mitigation**	**After Mitigation**	**Before Mitigation**	**After Mitigation**
3.2-1: Proposed project construction activities would generate temporary, short-term emissions of NO_x that could exceed FRAQMD, PCAPCD or SMAQMD-recommended thresholds.	S	LS	S	LS
3.2-2: Operation of the proposed project would generate long-term emissions of criteria pollutants that could exceed FRAQMD, PCAPCD or SMAQMD - recommended thresholds.	LS	NA	LS	NA
3.2-3: Construction and operation of the proposed project would not result in a cumulatively considerable increase in GHG emissions and would not either directly or indirectly, have a significant impact on the environment or conflict with any applicable plan, policy or regulation of an appropriate regulatory agency adopted for the purpose of reducing GHG emissions.	LS	NA	LS	NA

NOTES:

LS = Less than Significant Impact
S = Significant Impact

Impact 3.2-1: Proposed project construction activities would generate temporary, short-term emissions of NO_x that could exceed FRAQMD, PCAPCD or SMAQMD-recommended thresholds.

Initial Facilities

Proposed initial facilities include two medium capacity, on-site wastewater pump stations and one of three proposed force mains connecting the pump stations with the UNWI. Pump stations would be installed below ground in concrete vaults with control and electrical equipment located above ground in a fenced and secured area above the pump station. As shown in Figure 2-2, one pump station would be located within Zone 1 and one pump station would be located within Zone 2. Two miles of 12-inch diameter force main would connect the Zone 1 and Zone 2 pump stations and a seven mile long 14-inch diameter force main would connect the Zone 2 pump station to the point of connection with the UNWI near the intersection of Elkhorn Blvd. and W. 6th Street in Sacramento County. Zone 1 and Zone 2 could be developed independently or concurrently.

A project could result in adverse air quality effects if temporary, short-term construction-related or operational emissions of criteria air pollutants or precursors would exceed the thresholds of significance established by relevant local air pollution control district. Since the proposed project construction activities would occur in multiple air districts, the maximum daily and annual construction emissions generated during the construction of the pump stations and force main are compared to the FRAQMD, PCAPCD and SMAQMD significance thresholds for ROG, NO_x, PM_{10} and $PM_{2.5}$. Construction of the proposed project would use heavy equipment, such as dump trucks, excavators, cement trucks and mixers, pumps, bull dozers, backhoes, generators and trucks that would emit criteria pollutants.

The construction activities with the greatest potential for criteria pollutant emissions were modeled with CalEEMod based information provided by the applicant. It is anticipated that the construction of the pump stations and installation of the force main would require a construction crew consisting of an average of six and 20 construction workers over the duration of the construction period, respectively.

Pollutant emissions were estimated using CalEEMod (version 2013.2.2) software. The CalEEMod model was used to quantify construction NO_x, PM_{10}, and $PM_{2.5}$ emissions from off-road equipment, haul trucks associated with import of equipment, on-road worker vehicle emissions, and vendor delivery trips. The daily and yearly construction emissions are provided in **Tables 3.2-9** through **Table 3.2-11** and compared to the FRAQMD, PCAPCD and SMAQMD significance thresholds, respectively.

The pump stations and a portion of the proposed force main would be constructed within the jurisdiction of FRAQMD. As shown in Table 3.2-9, the construction of the pump stations and force main would result in the combined unmitigated annual construction pollutant emissions of NO_x that would exceed the FRAQMD's NO_x significance threshold. Therefore, construction pollutant emissions generated within the FRAQMD would result in a significant impact.

TABLE 3.2-9.
PROJECT-RELATED CONSTRUCTION EMISSIONS
WITHIN THE FRAQMD

	Unmitigated			Mitigated		
Construction Activity	**ROG (tpy)[1]**	**NO_x (tpy)[1]**	**PM_{10} (ppd)[1]**	**ROG (tpy)[1]**	**NO_x (tpy)[1]**	**PM_{10} (ppd)[1]**
Pump Station	0.4	3.1	5.3	0.4	2.5	3.1
Force Main[2]	<0.1	0.4	3.7	<0.1	0.3	2.3
Combined Emissions	0.4	3.5	8.9	0.4	2.8	5.4
FRAQMD Significance Threshold[3]	3	3	80	3	3	80
Exceed Significance Threshold?	No	Yes	No	No	No	No

NOTES:

1. Construction emissions estimates for summertime and annual conditions were made using CalEEMod 2013.2.2. See Appendix D for details.
2. Annual emissions of ROG and NOx were adjusted to reflect the emissions emitted in the FRAQMD.
3. FRAQMD ROG and NOx thresholds are estimated by multiplying the project length by 25 ppd, not to exceed 4.5 tpy.

SOURCE: ESA, 2016

A portion of the proposed force main would be constructed within the jurisdiction of the PCAPCD. As shown in Table 3.2-10, the construction of the force main would result in maximum daily unmitigated emissions that would not exceed the PCAPCD's significance threshold for ROG, NO_x and PM_{10}. Therefore, construction pollutant emissions generated within the PCAPCD would result in a less than significant impact.

TABLE 3.2-10.
PROJECT-RELATED CONSTRUCTION EMISSIONS
WITHIN THE PCAPCD

	Unmitigated			Mitigated		
Construction Activity	**ROG (ppd)[1]**	**NO_x (ppd)[1]**	**PM_{10} (ppd)[1]**	**ROG (ppd)[1]**	**NO_x (ppd)[1]**	**PM_{10} (ppd)[1]**
Force Main	5.8	62	3.7	5.5	49.6	2.3
PCAPCD Significance Threshold	82	82	82	82	82	82
Exceed Significance Threshold?	No	No	No	No	No	No

NOTES:

1. Construction emissions estimates for summertime and annual conditions were made using CalEEMod 2013.2.2. See Appendix D for details.

SOURCE: ESA, 2016

A portion of the proposed forced main would be constructed within the jurisdiction of SMAQMD. As shown in Table 3.2-11, the construction of the force main would result in maximum daily unmitigated emissions that would exceed the SMAQMD significance threshold for PM_{10} and $PM_{2.5}$. Therefore, construction pollutant emissions generated within the SMAQMD would result in a significant impact.

TABLE 3.2-11.
PROJECT-RELATED CONSTRUCTION EMISSIONS
WITHIN THE SMAQMD

Construction Activity	Unmitigated			Mitigated		
	NO_x (ppd)[1]	PM_{10} (ppd/tpy)[1]	$PM_{2.5}$ (ppd/tpy)[1]	NO_x (ppd)[1]	PM_{10} (ppd/tpy)[1]	$PM_{2.5}$ (ppd/tpy)[1]
Force Main	62	3.7/0.1	3.1/0.1	49.6	2.3/<0.1	1.8/<0.1
SMAQMD Significance Threshold[2]	85	0/0	0/0	85	80/14.6	82/15
Exceed Significance Threshold?	No	Yes/Yes	Yes/Yes	No	No/No	No/No

NOTES:

1. Construction emissions estimates for summertime and annual conditions were made using CalEEMod 2013.2.2. See Appendix D for details.
2. SMAQMD has established a zero emissions threshold for PM_{10} and $PM_{2.5}$ when a project does not implement their Best Management Practices (BMPs).

SOURCE: ESA, 2016

Future Facilities

The proposed future facilities include a pump station and sewer main south of W. Riego Road that would be located in similar agricultural fields as the proposed project pump stations. The future facilities include the construction of a sewer force main along the same alignment as the initial facilities. Although the construction schedules of the future facilities are unknown at this time, it is expected that they would require the use of the same off-road construction equipment that would be used during the construction of the initial facilities. This would result in similar maximum daily pollutant emissions as analyzed for the initial facilities. Therefore, pollutant emissions generated during the construction of future facilities would likely result in similar air quality impacts as shown under the Initial Facilities analysis, above, resulting in a significant impact.

Summary

For all phases of development, construction of the proposed project facilities would generate NO_x emissions that would exceed the FRAQMD significance threshold and PM_{10} and $PM_{2.5}$ emissions that would exceed the SMAQMD significance thresholds. This is considered a significant impact.

Mitigation Measures

Mitigation Measure 3.2-1 described below is the same as Mitigation Measure 3.4-1 on pages 3.4-28 through 3.4-30 of the 2009 SPSP EIR.

Mitigation Measure 3.2-1:

Implement Mitigation Measure 3.4-1 on pages 3.4-28 through 3.4-30 of the 2009 SPSP EIR Specific to Sutter County for all phases of construction).

The project applicant(s) of all project phases shall require their construction contractors, at the time construction is performed, to implement those construction mitigation measures that are required by the [FRAQMD]. For all construction activity on the project site, the project applicant(s) shall require construction contractors to implement both FRAQMD's Standard Mitigation Measures and Best Available Mitigation Measures for Construction Activity to reduce emissions to the maximum extent feasible for all construction activity performed in Sutter County. For all construction activity that would occur in another air district (i.e., outside of Sutter County), such as the installation of the sewer force main connection to SRCSD and other off-site improvements, the project applicant(s) shall require construction contractors to comply with the best management practices and construction emission reduction measures required by the respective local air district. No project-related construction activity shall occur until an emissions reduction plan developed by the contractor(s) is reviewed and approved in writing by Sutter County in consultation with the respective air district (i.e., FRAQMD, PCAPCD, or SMAQMD), or, where air district approval is required by law, with the approval of the air district. The following list presents all of the FRAQMD-required measures. (Both PCAPCD and SMAQMD require similar measures.)

1. The applicant shall implement FRAQMD's Fugitive Dust Control Plan with the following mitigation measures:

    - All grading operations on a project shall be suspended when winds exceed 20 miles per hour (mph) or when winds carry dust beyond the property line despite implementation of all feasible dust control measures.

    - Construction sites shall be watered as directed by the FRAQMD and as necessary to prevent fugitive dust violations.

    - An operational water truck shall be on-site at all times. Water shall be applied to control dust as needed to prevent visible emissions violations and off-site dust impacts.

    - On-site dirt piles or other stockpiled particulate matter shall be covered, wind breaks installed, and water and/or soil stabilizers employed to reduce windblown dust emissions. The use of approved nontoxic soil stabilizers shall be incorporated according to manufacturers' specifications to all inactive construction areas.

    - All transfer processes involving a free fall of soil or other particulate matter shall be operated in such a manner as to minimize the free fall distance and fugitive dust emissions.

    - Approved chemical soil stabilizers shall be applied according to the manufacturers' specifications to all inactive construction areas (previously graded areas that remain inactive for 96 hours), including unpaved roads and employee/equipment parking areas.

    - To prevent track-out, wheel washers shall be installed where project vehicles and/or equipment exit onto paved streets from unpaved roads. Vehicles and/or equipment shall be washed before each trip. Alternatively, a gravel bed may be

installed as appropriate at vehicle/equipment site exit points to effectively remove soil buildup on tires and tracks and prevent/diminish track-out.

- Paved streets shall be swept frequently (water sweeper with reclaimed water recommended; wet broom permitted) if soil material has been carried onto adjacent paved, public thoroughfares from the project site.

- Temporary traffic control shall be provided as needed during all phases of construction to improve traffic flow, as deemed appropriate by the appropriate department of public works and/or California Department of Transportation (Caltrans), and to reduce vehicle dust emissions. An effective measure is to enforce vehicle traffic speeds at or below 15 mph.

- Traffic speeds on all unpaved surfaces shall be reduced to 15 mph or less, and unnecessary vehicle traffic shall be reduced by restricting access. Appropriate training to truck and equipment drivers, on-site enforcement, and signage shall be provided.

- Ground cover shall be reestablished on the construction site as soon as possible and before final occupancy through seeding and watering.

- Open burning shall be prohibited at the project site. No open burning of vegetative waste (natural plant growth wastes) or other legal or illegal burn materials (e.g., trash, demolition debris) may be conducted at the project site. Vegetative wastes shall be chipped or delivered to waste-to-energy facilities (permitted biomass facilities), mulched, composted, or used for firewood. It is unlawful to haul waste materials off-site for disposal by open burning.

2. Construction equipment exhaust emissions shall not exceed FRAQMD Regulation III, Rule 3.0, Visible Emissions Limitations (40% opacity or Ringelmann 2.0). Operators of vehicles and equipment found to exceed opacity limits shall take action to repair the equipment within 72 hours or remove the equipment from service. Failure to comply may result in a notice of violation from FRAQMD.

3. The primary contractor shall be responsible for ensuring that all construction equipment is properly tuned and maintained before and for the duration of on-site operation.

4. Idling time shall be minimized to 5 minutes in accordance with CARB airborne air toxic control measure 13 (CCR Chapter 10 Section 2485) unless more time is required per engine manufacturers' specifications or for safety reasons.

5. Existing power sources (e.g., power poles) or clean-fuel generators shall be used rather than temporary power generators.

6. A traffic plan shall be developed to minimize traffic flow interference from construction activities. The plan may include advance public notice of routing, use of public transportation, and satellite parking areas with a shuttle service. Operations that affect traffic shall be scheduled for off-peak hours. Obstruction of through-traffic

lanes shall be minimized. A flag person shall be provided to guide traffic properly and ensure safety at construction sites.

7. Portable engines and portable engine-driven equipment units used on the project site, with the exception of on-road and off-road motor vehicles, may require CARB Portable Equipment Registration with the state or a local district permit. The owner/ operator of the equipment shall be responsible for arranging appropriate consultations with CARB or the FRAQMD to determine registration and permitting requirements before the equipment is operated at the site.

8. The project proponent shall assemble a comprehensive inventory list (i.e., make, model, engine year, horsepower, emission rates) of all heavy-duty off-road (portable and mobile) equipment (50 horsepower and greater) that will be used an aggregate of 40 or more hours for the construction project and provide a plan for approval by FRAQMD demonstrating that the heavy-duty (equal to or greater than 50 horsepower) off-road equipment to be used for construction, including owned, leased, and subcontractor vehicles, will achieve a project wide fleet-average 25% NO_X reduction and 45% particulate reduction compared to the most recent CARB fleet average at the time of construction. These equipment emission reductions can be demonstrated using the most recent version of the Construction Mitigation Calculator developed by the SMAQMD. Acceptable options for reducing emissions may include use of late-model engines, low emission diesel products, alternative fuels, engine retrofit technology (Carl Moyer Guidelines), after-treatment products, voluntary off-site mitigation projects, the provision of funds for air district off-site mitigation projects, and/or other options as they become available. In addition, implementation of these measures would also result in a 5% reduction in ROG emissions from heavy-duty diesel equipment. FRAQMD shall be contacted to discuss alternative measures.

Significance after Mitigation: As described in the 2009 SPSP EIR, implementation of Mitigation Measure 3.4-1 would result in a minimum 25-percent reduction in NO_x emissions and a 45-percent reduction in PM exhaust emissions from heavy-duty diesel equipment, as compared with statewide average emissions. In addition, the dust control measures would reduce fugitive PM_{10} dust emissions by approximately 75 percent. Implementation of these measures would reduce temporary, short-term, construction-related emissions of NO_x, and PM_{10} and $PM_{2.5}$ generated by project construction to below all applicable air district significance thresholds. As a result, construction emissions of NO_x, PM_{10} and $PM_{2.5}$ would be ***less-than-significant***.

Impact 3.2-2: Operation of the proposed project would generate long-term emissions of criteria pollutants that could exceed FRAQMD, PCAPCD or SMAQMD-recommended thresholds.

Initial Facilities

Over the long-term, the proposed project would increase emissions primarily due to onsite stationary sources, which include diesel emergency backup generators. Each pump station would have one diesel-powered emergency backup generator for emergency use. As part of routine maintenance, the emergency backup generator would be tested several times per year, to ensure

proper working order. These tests would not exceed 100 hours per year per generator as required by FRAQMD Rule 3.22. Aside from testing, the emergency generators would not be operated except during power outages or other emergency situations. Operational criteria pollutant emissions generated by the diesel powered emergency backup generators were calculated using emission factors found in EPA's *AP 42 Compilation of Air Pollutant Emission Facts* (EPA, 2009). Since the two electric pumps are assumed to have a power output of approximately 52 to 290 horse power (hp), it is conservatively assumed that each pump station would have one 300 hp emergency backup generator. The estimates shown in **Table 3.2-12** are based on two 300 hp diesel-powered generators operating for a cumulative 80 hours per year or two hours on any given day. Modeling assumptions and calculations are included in Appendix D.

TABLE 3.2-12.
OPERATIONAL EMISSIONS ESTIMATES
500 HP DIESEL-POWERED EMERGENCY BACKUP GENERATOR

Category	ROG	NO_x	PM_{10}	$PM_{2.5}$
Diesel Emergency Backup Generator Emissions (ppd)[1]	0.22	2.66	<10.01	<0.01
FRQAMD Significance Threshold (ppd)	25	25	25	80
Significant (Yes or No)?	No	No	No	No

NOTE:

1. Project operational emissions estimates for the diesel powered emergency generators dust made using emission factors found in EPA's AP 42 Compilation of Air Pollutant Emission Facts (U.S. EPA, 2009). Modeling results can be found in Appendix D.

SOURCE: ESA, 2016

Based on the estimates shown in Table 3.2-9, criteria pollutants emitted by the two diesel-powered emergency backup generators would not exceed the FRAQMD significance threshold for ROG, NO_x, PM_{10} and $PM_{2.5}$. In addition, only a few employee trips would be required periodically for routine inspection and maintenance, and would result in negligible emissions to the local air quality environment. Therefore this is considered a less-than-significant impact.

Future Facilities

The proposed future facilities would include one larger pump and emergency backup generator with similar energy use as those of the proposed initial facilities. As a result, pollutant emissions generated during the operation of the future facilities would be similar to those evaluated for the initial facilities. Therefore, operational emissions from the future facilities would result in a less-than-significant impact; the same as for the initial facilities.

Summary

Since operational emissions from the emergency backup generators at both the initial and future facilities would not exceed the FRAQMD significance threshold for ROG, NO_x, PM_{10} and $PM_{2.5}$, this impact would be considered a ***less-than-significant impact***.

Mitigation Measures

None Required.

Impact 3.2-3: Construction and operation of the project would not result in a cumulatively considerable increase in GHG emissions and would not either directly or indirectly, have a significant impact on the environment or conflict with any applicable plan, policy or regulation of an appropriate regulatory agency adopted for the purpose of reducing GHG emissions.

As previously stated, the FRAQMD and PCAPCD have not adopted a significance threshold for GHG emissions during either construction or operations. Therefore, for this analysis, the SMAQMD recently adopted GHG thresholds for impact significance determinations of 10,000 metric tons CO_2e per year for stationary sources and 1,100 metric tons CO_2e per year for construction-related activities are used to evaluate GHG impacts during the construction and operation of the pump stations and force main.

Initial Facilities

Construction

During short-term construction of the pump stations, odor control facility (if required) and force main, GHG emissions would be generated by vehicle engine exhaust from off-road equipment, haul trips and construction worker trips. GHG emissions generated during the construction of the pump stations and force main were estimated using CalEEMod (version 2013.2.2) software. The highest annual GHG emissions during the one year combined (pump stations, odor control facility and force main) construction period would be approximately 518 metric tons of CO_2e, which includes heavy duty construction equipment, haul trucks, delivery trucks and construction worker vehicles. These GHG emissions would fall well below the adopted SMAQMD significance threshold and would result in a less-than-significant impact.

Operation

The proposed initial facilities would include two on-site medium capacity wastewater pump stations and one odor control facility located adjacent to the existing UNWI easement area at the southwest corner of Elkhorn Blvd. and W. 6th Street. GHG emissions associated with the operational phase of the proposed project were estimated using GHG intensity factors provided by PG&E that would provide power to the two medium capacity on-site wastewater pump stations and SMUD that would provide power to the odor control facility. Although the two pump stations and odor control facility themselves would not generate any GHG emissions, indirect GHG emissions would be generated off-site by PG&E and SMUD to provide the pump stations and odor control facility with power, respectively. These indirect source emissions are compared to the SMAQMD GHG significance threshold for stationary sources. During the first year of operations, the electricity used at the electric pumps and fans at the odor control facility would

generate indirect GHG emissions equal to 301 metric tons of CO_2e. These GHG emissions would fall well below the adopted SMAQMD significance threshold of 10,000 metric tons for stationary sources and would result in a less-than-significant impact.

Future Facilities

As previously discussed in Impact 3.2-1 and Impact 3.2-2, construction and operational activities associated with the future facilities would be very similar to those under the initial facilities. Construction of the future facilities would use the same off-road equipment as those proposed under the initial facilities, which would result in very similar construction-related GHG emissions. The pumps proposed under the future facilities would be similar to those proposed under the initial facilities, which would result in very similar operational- related GHG emissions. Therefore, construction and operational GHG impacts associated with the future facilities would be considered less than significant.

Summary

In summary, GHG emissions generated during construction and operation of the proposed project would not exceed any of the GHG significance thresholds adopted by SMAQMD. Therefore, the project would not conflict with any local regulations pertaining to GHGs and would not result in a cumulatively considerable increase in GHG emissions such that the project would impair the State's ability to implement AB 32. This impact would be ***less than significant***.

Mitigation Measures

None required.

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3.3 Biological Resources

3.3.1 Introduction

This section addresses potential impacts associated with biological resources, specifically impacts to potential loss and degradation of jurisdictional wetlands and other waters of the U.S. and riparian habitat, as a result of construction and operation of the proposed project. All other impacts related to biological resources, including impacts to special status plant and wildlife species, were determined to be adequately addressed in the 2009 SPSP EIR as discussed in the Environmental Checklist included as Appendix B in this Focused Tiered EIR. All relevant information, including applicable environmental and regulatory setting, standards of significance, and mitigation measures identified in Section 3.13 of the 2009 SPSP EIR, are incorporated by reference and summarized and updated below, as appropriate.

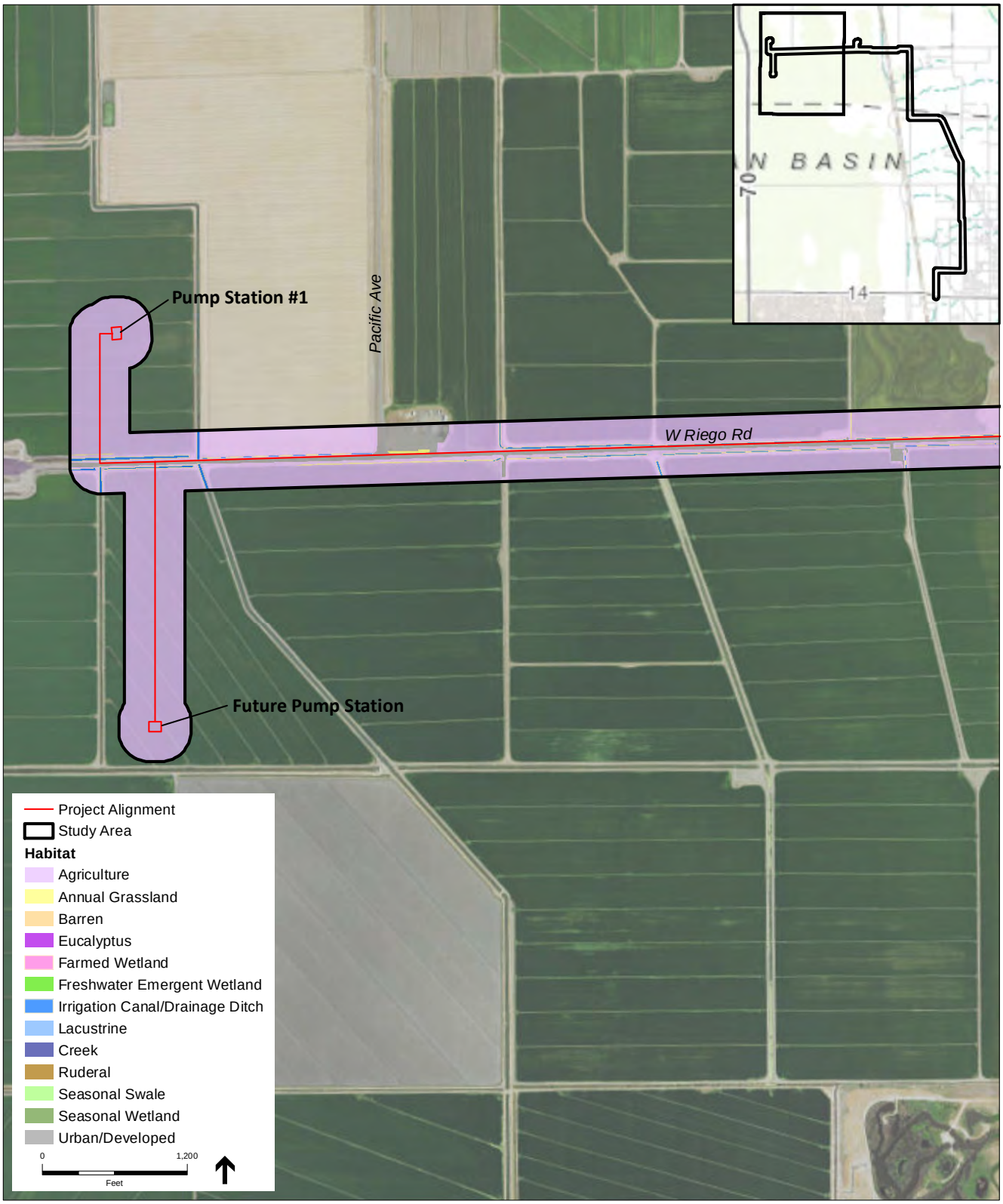
No comments were received in response to the NOP related to biological resources (see Appendix C).

3.3.2 Environmental Setting

The proposed project consists of sewer pump stations and wastewater force main pipelines. The pump stations and the pipeline alignments to W. Riego Road within the SPSP area are primarily used for agriculture; predominantly for rice production. The rest of the proposed project alignment outside of the SPSP area is surrounded by habitat and land uses along road rights-of way that pass through a patchwork of urban and rural residential land uses, annual grassland, agriculture, barren, ruderal and eucalyptus woodland with occasional canals and small creeks or drainages as well as other wetland features (ESA, 2015).

Field surveys and wetland delineations were conducted within the SPSP area for the 2009 SPSP EIR (ECORP, 2007). More recently ESA and ECORP conducted field surveys within portions of the SPSP area in January and June 2015 and January and February 2016. These surveys were done in preparation of submitting a revised wetland delineation and jurisdictional determination to the U.S. Army Corps of Engineers. Outside of the SPSP area, habitat information was gathered by ESA during a reconnaissance survey on October 29, 2014. A formal wetland survey was not conducted for this area but potential wetlands and other waters of the U.S. were noted where observed.

Figures 3.3-1 through **3.3-4** show aquatic features and habitat identified within 250 feet of the proposed project, during the 2014-2016 surveys conducted by ESA and ECORP. The aquatic habitat types known to occur along the project alignment are described below.

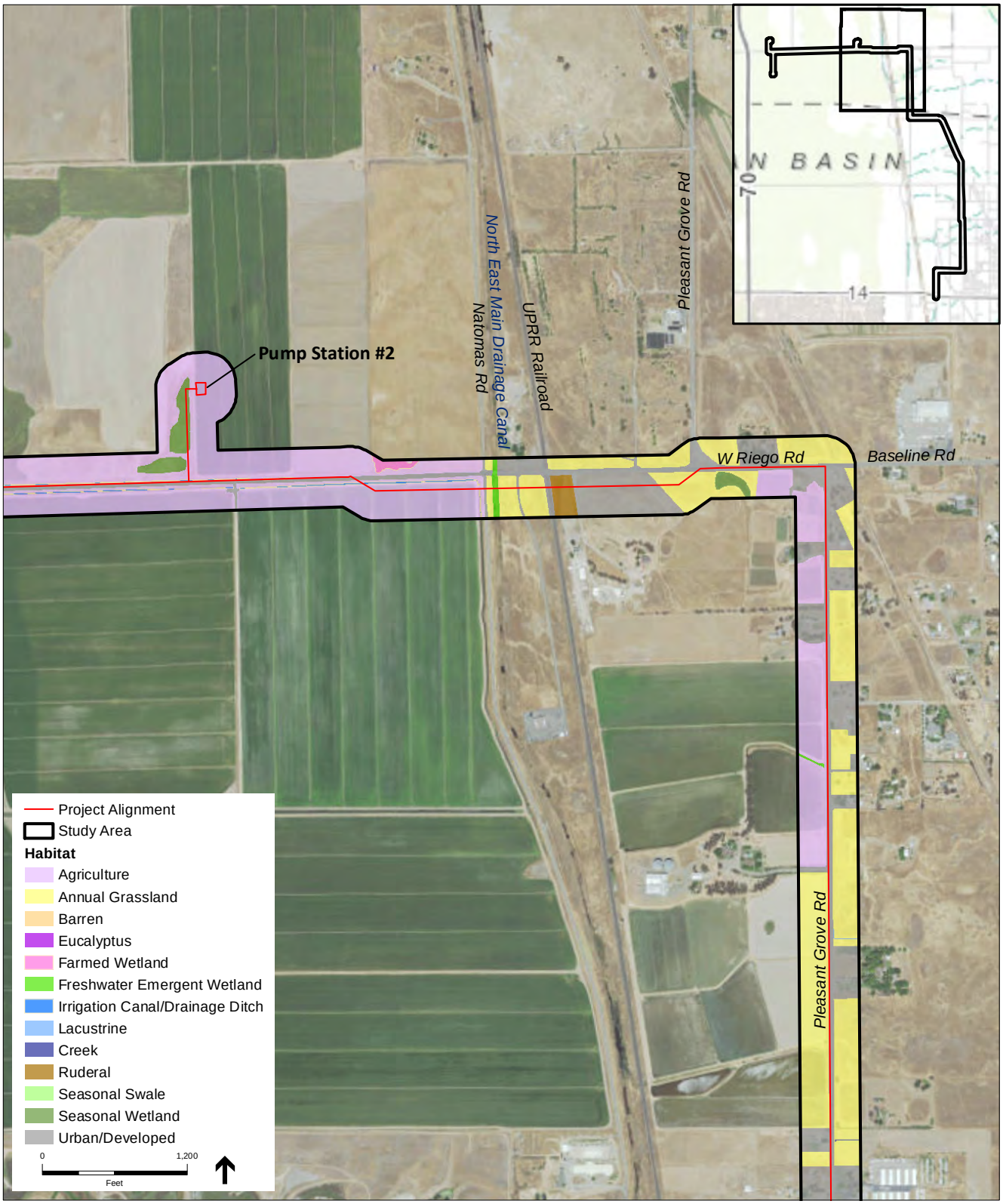


SOURCE: Microsoft, 2010; Sutter County, 2015; ESA, 2016

Sutter Pointe Sewer Pipeline Alignment Project . 130145.01

Figure 3.3-1

Habitats in the Study Area

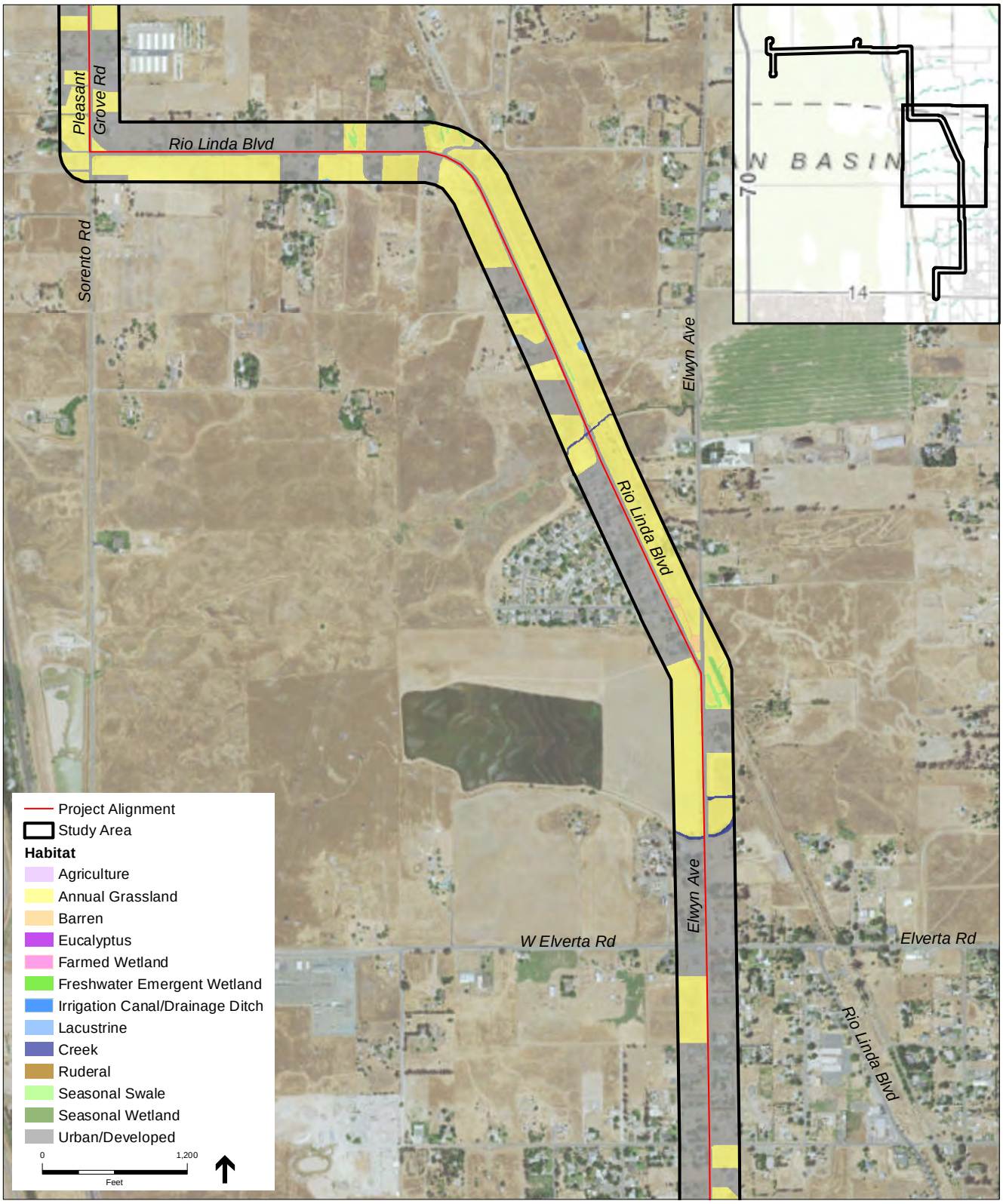


SOURCE: Microsoft, 2010; Sutter County, 2015; ESA, 2016

Sutter Pointe Sewer Pipeline Alignment Project . 130145.01

Figure 3.3-2

Habitats in the Study Area

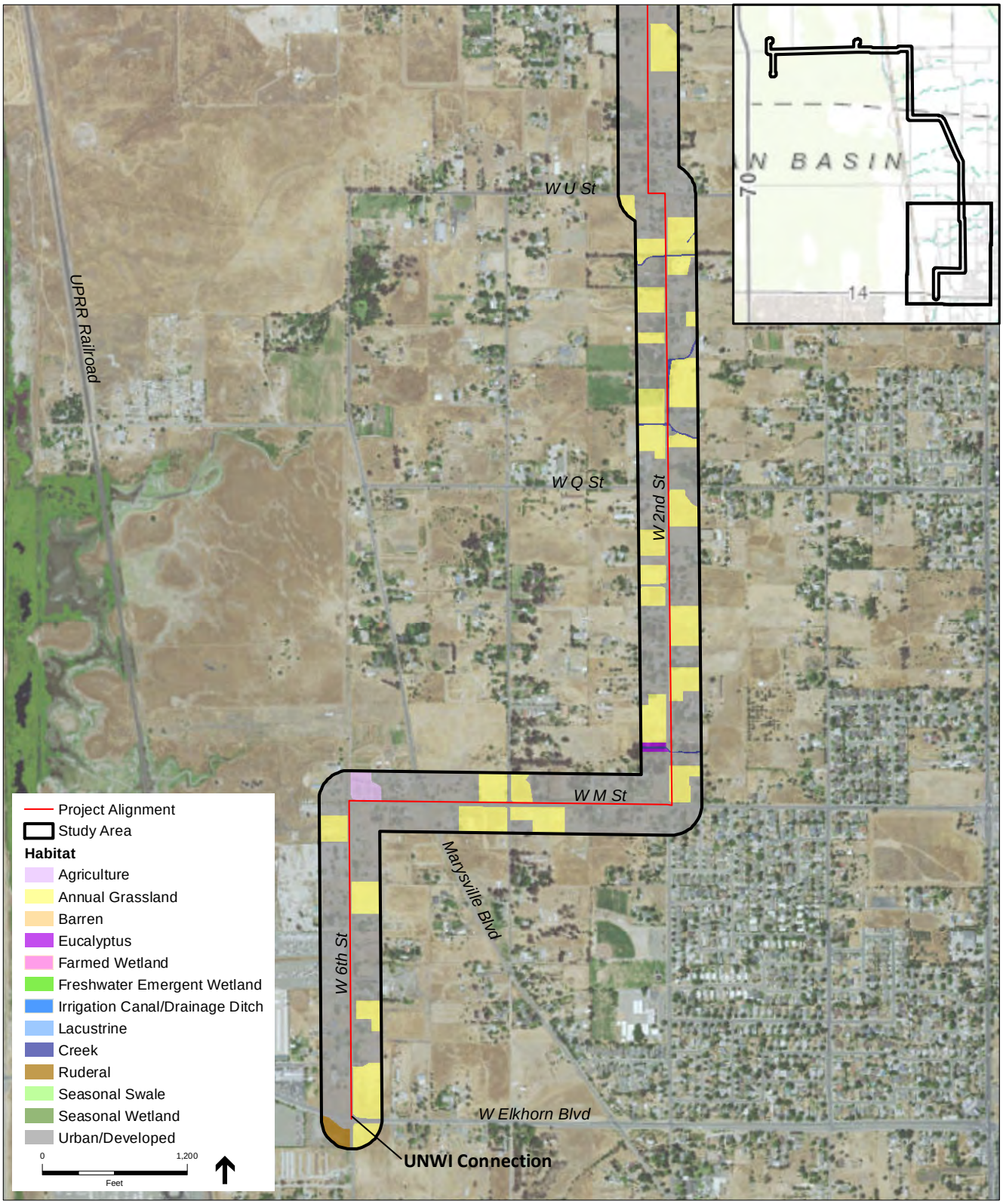


SOURCE: Microsoft, 2010; Sutter County, 2015; ESA, 2016

Sutter Pointe Sewer Pipeline Alignment Project . 130145.01

Figure 3.3-3

Habitats in the Study Area



SOURCE: Microsoft, 2010; Sutter County, 2015; ESA, 2016

Sutter Pointe Sewer Pipeline Alignment Project . 130145.01

Figure 3.3-4

Habitats in the Study Area

Wetland, Other Waters and Riparian Habitat Types

Wetland, other waters and riparian habitats are present along the project alignment. These habitats include irrigation canals and ditches, creeks, seasonal wetlands, freshwater emergent marsh, and riparian areas.

Seasonal Wetlands/Swales

Seasonal wetlands are characterized by depressions lacking an outlet that hold ponded water for short periods following winter and spring rains. These areas often have distinct substrates, such as a hardpan, claypan, or bedrock that prevent water loss from percolation and contain specific wetland plant species. Seasonal swales are similar depressions but may hold water for less time and generally do not contain wetland plant species.

Two seasonal wetlands (1.66 acres and 0.94 acres) are located near the site of the proposed pump station #2 (see Figure 3.3-2). A 0.7-acre seasonal wetland is located on the south side of W. Riego Road, near the intersection with Pleasant Grove Road (see Figure 3.3-2). Several seasonal swales are located along Rio Linda Boulevard most of which correspond to depressions at the toe of the slope of an abandoned rail right-of-way (see Figure 3.3-3).

Freshwater Emergent Wetlands

The only freshwater emergent wetland within the project area is associated with the NEMDC located immediately outside of the SPSP area boundary along W. Riego Road (see Figure 3.3-2). Vegetation commonly found in freshwater emergent marshes include cattail (*Typha* spp.), sedges (*Carex* ssp.), and bulrush (*Scirpus* spp.).

Farmed Wetlands

Farmed wetlands are generally depression features similar to a seasonal wetland, however because they occur at a location that is actively farmed they may lack one or more traditional wetland characteristic. Under normal circumstances, the definition of wetlands requires three wetland identification parameters be present: wetland hydrology, hydric soils, and hydrophytic vegetation. In the case of farmed wetlands irrigation or crops may inhibit the ability to identify natural hydrology and vegetation conditions. Several farmed wetlands were identified with the SPSP area associated with both irrigated (rice) and dry farmed fields as shown in Figures 3.3-1 through 3.3-4.

Irrigation Canals and Ditches

Various canals and ditches cross or at times parallel the proposed project force main alignment. The SPSP area includes an extensive network of canals and ditches that are part of a complex agricultural supply and drainage system. This system is completely enclosed by levees, and there is no natural drainage out of the basin. Urban and agricultural drainage water is eventually pumped out of the basin and into the Sacramento River. The largest canal that crosses the project

alignment is the NEMDC located immediately outside of the eastern edge of SPSP area boundary along W. Riego Road (see Figure 3.3-2). Additional small canals and ditches cross or parallel the project alignment outside of the SPSP area along Rio Linda Blvd., Elwin Avenue and W. 2nd Street.

Most of the ditches in the project area are unvegetated, except for relatively narrow strips of wetland vegetation at the ordinary high-water mark. Also present are scattered mature Goodding's black willow (*Salix gooddingii*) and Fremont's cottonwood (*Populus fremontii*) along the banks (ECORP, 2007).

Creeks

Outside of the SPSP area, the project alignment crosses several drainages along Rio Linda Boulevard, Elwin Avenue and W. 2nd Street that are likely remnants of natural creeks. Many of these have been highly modified including the straightening of channels and control of flows for agricultural use. Riparian vegetation at these locations varies and may include non-native or ornamental plantings in relation to nearby homes.

Riparian Areas

Riparian habitat includes both scrub and woodland habitats. Riparian habitat occurs along the NEMDC and other creeks, canals, and ditches that crossed by the project alignment. These riparian areas are typified by the presence of woody vegetation, such as shrubby willows (*Salix exigua* and *Salix lasiolepis*) and cottonwood.

Natomas Basin Habitat Conservation Plan

The 2003 Natomas Basin Habitat Conservation Plan (NBHCP) (City of Sacramento, 2003) was prepared by the City of Sacramento, Sutter County, and the Natomas Basin Conservancy (NBC). It was developed to promote biological conservation in conjunction with economic and urban development in the Natomas Basin. The NBHCP establishes a multispecies conservation program to minimize and mitigate the expected loss of habitat values and incidental take of "covered species" that could result from urban development and operation and maintenance of irrigation and drainage systems. The NBHCP authorizes take associated with 17,500 acres of urban development in southern Sutter County and in the City of Sacramento and Sacramento County (i.e., 8,050 acres for the City of Sacramento, 7,467 acres for Sutter County, and 1,983 acres for Metro Air Park in Sacramento County). This area includes the portion of the project alignment within the SPSP area boundary. Through implementation of the NBHCP the NBC has acquired and manages over 4,000 acres of mitigation lands within the Natomas Basin (NBC, 2016). The closest NBHCP mitigation lands to the project alignment are a series of parcels on the south side of the boundary between Sutter County and Sacramento County running west to east between SR 99 and the NEMDC. These lands are approximately one mile south of the proposed project force main alignment along W. Riego Road and a half mile west of the proposed project force main alignment at the intersection of Pleasant Grove Road and Rio Linda Blvd.

3.3.3 Regulatory Setting

Biological resources in California are protected and/or regulated by a variety of federal and State laws and policies. Key regulatory and conservation planning issues applicable to the proposed project are discussed below. This section also describes the proposed project as it relates to regulation within the NBHCP. The portion of the project within the SPSP area is also located within the NBHCP Sutter Permit Area and is authorized under the NBHCP Sutter County incidental take permit (ITP).

Federal Plans, Policies, Regulations, and Laws

Clean Water Act

Section 404 of the federal Clean Water Act (CWA) establishes a requirement for a project proponent to obtain a permit from the U.S. Army Corps of Engineers (USACE) before engaging in any activity that involves any discharge of dredged or fill material into "waters of the United States," including wetlands. Waters of the United States include navigable waters of the United States, interstate waters, all other waters where the use or degradation or destruction of the waters could affect interstate or foreign commerce, tributaries to any of these waters, and wetlands that meet any of these criteria or that are adjacent to any of these waters or their tributaries. Wetlands are defined as those areas that are inundated or saturated by surface water or groundwater at a frequency and duration sufficient to support, and that under normal circumstances do support, a prevalence of vegetation typically adapted for life in saturated soil conditions. Jurisdictional wetlands must meet three wetland delineation criteria: hydrophytic vegetation, hydric soil types, and wetland hydrology. Many surface waters and wetlands in California meet the criteria for waters of the United States, including intermittent streams and seasonal lakes and wetlands.

The first step in seeking a Section 404 permit is to determine whether the area in question contains jurisdictional waters of the United States.[1] Thus, the applicant should approach USACE for a verified jurisdictional determination, which the applicant typically performs through a submission of a wetland delineation including maps and data forms. The regulatory staff of USACE will then perform a field review. Any wetlands that are not jurisdictional would fall within the regulatory authority of the Regional Water Quality Control Board (RWQCB), as discussed below, as "waters of the State."

In early 2001, the U.S. Supreme Court issued a landmark ruling regarding the regulation of isolated intrastate waters by USACE in *Solid Waste Agency of Northern Cook County v. U.S. Army Corps of Engineers*. Before this decision, USACE generally extended its jurisdiction over wetlands beyond "adjacent wetlands" and regulated the discharge of dredged or fill material into any intrastate wetlands and isolated waters, whether or not they had a link to navigable waters.

1 As stated above, the CWA prohibits the discharge of pollutants, including dredged and fill material, into "navigable waters" without a federal permit and defines the term "navigable waters" as "waters of the United States." By regulation, USACE's jurisdiction extends to wetlands "adjacent" to waters of the United States.

The U.S. Supreme Court held that USACE jurisdiction under Section 404 of the CWA does not extend to non-navigable, isolated, intrastate waters based solely on the fact that these waters are used as habitat by migratory birds. In 2006, the Supreme Court again attempted to clarify the extent of USACE jurisdiction of isolated waters in *Rapanos v. United States*. The test established in *Rapanos* is that only a water that possesses a "significant nexus to waters that are navigable-in fact or that could reasonably be so made" are subject to regulation under CWA.

On December 2, 2008, the EPA and USACE issued updated joint guidance to establish the protocol for determining the presence of waters of the United States under the U.S. Supreme Court's 2006 *Rapanos* decision. The guidance directs the agencies to more thoroughly document jurisdiction using a standardized form. Agencies will continue to assert jurisdiction over traditional navigable waters (TNWs) and adjacent wetlands. The agencies will have jurisdiction over a water body that is not a TNW if that water body is "relatively permanent." Jurisdiction will be asserted over tributaries that are not relatively permanent on a case-by-case basis applying a "significant nexus" analysis to determine whether there is a significant nexus between the tributary and a TNW.

In accordance with Section 401 of the CWA, projects that apply for a USACE permit for discharge of dredged or fill material must obtain water quality certification from the appropriate RWQCB, in this case, the Central Valley RWQCB, indicating that the proposed project would uphold state water quality standards.

State Plans, Policies, Regulations, and Laws

California Fish and Game Code Section 1602—Streambed Alteration

All diversions, obstructions, or changes to the natural flow or bed, channel, or bank of any river, stream, or lake in California that supports wildlife or fishery resources are subject to regulation by the California Department of Fish and Wildlife (CDFW) under Section 1602 of the California Fish and Game Code. Under Section 1602, it is unlawful for any person, governmental agency, or public utility to do the following without first notifying CDFW: substantially divert or obstruct the natural flow of, or substantially change or use any material from, the bed, channel, or bank of any river, stream, or lake, or deposit or dispose of debris, waste, or other material containing crumbled, flaked, or ground pavement where it may pass into any river, stream, or lake. A stream is defined as a body of water that flows at least periodically or intermittently through a bed or, channel that has banks and supports fish or other aquatic life. This definition includes watercourses with a surface or subsurface flow that supports or has supported riparian vegetation. CDFW's jurisdiction within altered or artificial waterways is based on the value of those waterways to fish and wildlife. Proposed project facilities that would result in an impact on a river, stream, or lake will require a CDFW streambed alteration agreement.

Porter-Cologne Water Quality Control Act

Under the Porter-Cologne Water Quality Control Act, "waters of the state" fall under the jurisdiction of the appropriate RWQCB. The RWQCB must prepare and periodically update water quality control plans (basin plans). Each basin plan sets forth water quality standards for surface water and groundwater, as well as actions to control nonpoint and point sources of pollution to achieve and maintain these standards. Projects that discharge waste to wetlands or waters of the state or waters of the U.S. must meet waste discharge requirements of the RWQCB, which may be issued in addition to a water quality certification or waiver under Section 402 of the CWA. More recently, the appropriate RWQCB has also generally taken jurisdiction over "waters of the state" that are not subject to USACE jurisdiction under the CWA, in cases where USACE has determined that certain features do not fall under its jurisdiction. Mitigation requiring no net loss of wetlands functions and values of waters of the state is typically required.

Regional and Local Plans, Policies, Regulations, and Ordinances

Sutter County General Plan

The Sutter County General Plan (Sutter County, 2011) provides overall guidance for resource conservation in Sutter County and includes several resource conservation goals and objectives. The Sutter County General Plan includes policies that generally address preservation of natural vegetation, including wetlands. It requires that new development mitigate for loss of federally protected wetlands to achieve "no net loss," and encourages the use of wetland mitigation banks.

The Sutter County General Plan applies to those portions of the project alignment with Sutter County. The following goal and policies from the Sutter County General Plan regarding biological resources are applicable to the proposed project:

GOAL ER 2: Conserve, protect, and enhance Sutter County's significant natural wetland and riparian habitats.

- **Policy ER 2.1: No Net Loss.** Require new development to ensure no net loss of state and federally regulated wetlands, other waters of the United States (including creeks, rivers, ponds, marshes, vernal pools, and other seasonal wetlands), and associated functions and values through a combination of avoidance, restoration, and compensation.

- **Policy ER 2.3: Minimize Surface Runoff.** Minimize direct discharge of surface runoff into wetland areas and design new development in such a manner that pollutants and siltation will not significantly affect jurisdictional wetlands.

GOAL ER 3: Conserve, protect, and enhance Sutter County's varied wildlife and vegetation resources.

- **Policy ER 3.6: Natural Vegetation.** Preserve important areas of natural vegetation and the ecological integrity of these habitats, where feasible, including but not limited to riparian, vernal pool, marshes, oak woodlands and annual grasslands. (ER 3-A)

Sacramento County General Plan

The Sacramento County 2030 General Plan (Sacramento County, 2011) provides overall guidance for resource conservation in Sacramento County and includes several resource conservation goals and objectives. The Sacramento County General Plan includes policies that generally address preservation of habitats, species and aquatic resources. It limits where and how new development should occur and requires "no net loss of wetlands, riparian woodlands, and oak woodlands," as well as priorities for mitigation of impacts.

The Sacramento County 2030 General Plan applies to the portion of the project alignment within Sacramento County. The following goal and policies from the Sacramento County General Plan regarding biological resources are applicable to the proposed project:

GOAL: Preserve and manage natural habitats and their ecological functions throughout Sacramento County.

- **Objective:** Mitigate and restore for natural habitat and special status species loss.
- **Policy CO-58:** Ensure no net loss of wetlands, riparian woodlands, and oak woodlands.
- **Policy CO-59:** Ensure mitigation occurs for any loss of or modification to the following types of acreage and habitat function:
    - vernal pools,
    - wetlands,
    - riparian,
    - native vegetative habitat, and
    - special status species habitat.
- **Policy CO-60:** Mitigation should be directed to lands identified on the Open Space Vision Diagram and associated component maps (please refer to the Open Space Element).
- **Policy CO-61:** Mitigation should be consistent with Sacramento County-adopted habitat conservation plans.
- **Policy CO-62:** Permanently protect land required as mitigation.

GOAL: Preserve, protect, and enhance natural open space functions of riparian, stream and river corridors.

- **Objectives:** Manage riparian corridors to protect natural, recreational, economic, agricultural and cultural resources as well as water quality, supply and conveyance.
- **Policy CO-88:** Where removal of riparian habitat is necessary for channel maintenance, it will be planned and mitigated so as to minimize unavoidable impacts upon biological resources.

- **Policy CO-89:** Protect, enhance and maintain riparian habitat in Sacramento County.

- **Policy CO-92:** Enhance and protect shaded riverine aquatic habitat along rivers and streams.

Placer County General Plan

The Placer County General Plan (Placer County, 2013) identifies setbacks from streams and other sensitive habitats; a "no net loss" policy for federally protected and state-protected wetlands; and general preservation of outstanding areas of natural vegetation, including oak woodlands, riparian habitat, and vernal pools. The Placer County Code specifically addresses protection of native, landmark, and riparian zone trees and indicates replacement of removed trees may be required. Other policies involve preserving and protecting waterfowl resources; establishing wildlife corridors to prevent biological islands; and enhancing and promoting the preservation of rare, threatened, or endangered wildlife through participation in mitigation programs.

The Placer County General Plan applies to areas proposed for off-site sewer force mains and dry utilities. The following goal and policies from the Placer County General Plan regarding biological resources are applicable to those components of the proposed project:

GOAL 6.B. To protect wetland communities and related riparian areas throughout Placer County as valuable resources.

- **Policy 6.B.1:** The County shall support the "no net loss" policy for wetland areas regulated by the U.S. Army Corps of Engineers, the U.S. Fish and Wildlife Service, and the California Department of Fish and Wildlife. Coordination with these agencies at all levels of project review shall continue to ensure that appropriate mitigation measures and the concerns of these agencies are adequately addressed.

- **Policy 6.B.2:** The County shall require new development to mitigate wetland loss in both federal jurisdictional and non-jurisdictional wetlands to achieve "no net loss" through any combination of the following, in descending order of desirability: (1) avoidance; (2) where avoidance is not possible, minimization of impacts on the resource; or (3) compensation, including use of a mitigation and conservation banking program that provides the opportunity to mitigate impacts to special status, threatened, and endangered species and/or the habitat which supports these species in wetland and riparian areas. Non-jurisdictional wetlands may include riparian areas that are not federal "waters of the United States" as defined by the Clean Water Act.

- **Policy 6.B.5:** The County shall require development that may affect a wetland to employ avoidance, minimization, and/or compensatory mitigation techniques. In evaluating the level of compensation to be required with respect to any given project, (a) on-site mitigation shall be preferred to off-site, and in-kind mitigation shall be preferred to out-of-kind; (b) functional replacement ratios may vary to the extent necessary to incorporate a margin of safety reflecting the expected degree of success associated with the mitigation plan; and (c) acreage replacement ratios may vary depending on the relative functions and values of those wetlands being lost and those being supplied, including compensation for temporal losses. The County shall continue to implement and refine criteria for determining when an alteration to a wetland is considered a less-than significant impact under CEQA.

3.3.4 Impacts and Mitigation Measures

Significance Criteria

For the purpose of this analysis, the relevant standards of significance from the 2009 SPSP EIR have been used to determine whether implementing the proposed project would result in a significant impact. These thresholds of significance are also based on Appendix G of the State CEQA Guidelines. A biological resources impact is considered significant if implementation of the proposed project would:

- Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, or regulations or by CDFW or USFWS;
- Have a substantial adverse effect on federally protected wetlands as defined by Section 404 of the CWA (including, but not limited to, marshes, vernal pools, and coastal areas) or any state-protected wetlands not subject to regulation under Section 404 of the CWA through direct removal, filling, hydrological interruption, or other means.

All other impacts related to biological resources, including impacts to special status plant and wildlife species, were determined to be adequately addressed in the 2009 SPSP EIR, including specific mitigation measures, as discussed in the Environmental Checklist included as Appendix B in this Focused Tiered EIR.

Methodology

Analysis presented in this section focuses on the permanent and temporary impacts to wetlands and other Waters of the U.S. and riparian habitat as a result of construction and operation of the proposed project. This analysis of impacts to biological resources resulting from implementing the proposed project is based on review of data collected during field surveys, existing documentation that addresses biological resources on or near the project site, geographic information systems (GIS) data, and site-specific information collected by biologists for the 2009 SPSP EIR.

Reconnaissance-level surveys of the project alignment outside of the SPSP area was conducted by ESA biologist LeChi Huynh on October 29, 2014 between the hours of 0900 and 1200. The reconnaissance was conducted via a "windshield survey," where Ms. Huynh drove the entire alignment with frequent stops along the alignment to record habitat types, potential wetlands and other waters of the U.S., and potential habitat features which could support special-status species. A formal wetland delineation was not conducted at the time of the survey; however, potential wetlands and other waters of the U.S. were noted where observed. Aerial maps of the study area and adjacent lands were used to record potential habitat features for special-status species. The surveys were conducted during partially cloudy weather (60-65°F), with full visibility.

Within the SPSP area of the project alignment, sources of site-specific information include:

- Field surveys conducted by ESA and ECORPS in January and June 2015 and January and February 2016.
- Wetland Delineation for Sutter Pointe Specific Plan, Sutter County, California (ECORP, 2007) (Appendix H of the Sutter Pointe Specific Plan DEIR);
- Biological Effectiveness Monitoring for the NBHCP Area – 2006 Annual Survey Results (NBC, 2007).

This impact analysis assumes direct impacts from the portion of the alignment that would be constructed in an open trench as well as the pump station locations, horizontal directional drilling (HDD) and jack and bore pits. Temporary impacts are assumed within 25 feet of trench and pit locations for construction vehicle access. All on-site and off-site staging and laydown areas would be located outside of wetlands and other environmentally sensitive areas.

Impacts Adequately Analyzed in the SPSP EIR or not Applicable to the Project

As determined in the Environmental Checklist provided in Appendix B, the proposed project would not interfere with wildlife movement or migration and would not conflict with any local policies and ordinances or conservation plans including the NBHCP. Implementation of the NBHCP and 2009 SPSP EIR mitigation measures would ensure that potential impacts on special-status species and habitat are minimized to less-than-significant levels. These issues were determined to be adequately analyzed in the 2009 SPSP EIR and, therefore, are not evaluated in this section of the Focused Tiered EIR.

Summary of Impacts

Table 3.3-1 provides a summary of the impacts identified for the proposed project. The level of significance after any mitigation measures is also presented. Each of these impacts is discussed in more detail below.

TABLE 3.3-1.
PROPOSED PROJECT IMPACT SUMMARY – BIOLOGICAL RESOURCES

Impact	Initial Facilities		Future Facilities	
	Before Mitigation	After Mitigation	Before Mitigation	After Mitigation
3.3-1: Implementation of the proposed project could place fill material into jurisdictional waters of the United States which could result in the potential loss and degradation of wetland habitats protected under federal, State and local regulations.	S	LS	S	LS
3.3-2: Implementation of the proposed project could result in the removal of riparian habitat that has the potential to support special-status species in areas within and adjacent to the creeks and canals crossed by the project.	S	LS	S	LS

S = Significant Impact
LS = Less than Significant Impact

Impact 3.3-1: Implementation of the proposed project could place fill material into jurisdictional waters of the United States which could result in the potential loss and degradation of wetland habitats protected under federal, State and local regulations.

Initial Facilities

Based on previous wetland delineations and surveys the proposed project would cross several canals, ditches and creeks. The largest of those, the NEMDC and Natomas East Levee, would be crossed by the project alignment using HDD construction techniques to install pipelines underground below the canal to avoid impacting the canal and the associated freshwater emergent wetland. All other drainages crossed by the project alignment would be temporarily impacted by open trench or jack and bore construction methods and would be restored to the original condition at the completion of construction. Because the majority of the project alignment is within the existing roadway rights-of-way, most of the drainage crossings occur at existing culverts or bridge structures that would, therefore, minimize impacts to habitat. Modification or replacement of some of the culvert structures may be required.

Likewise, seasonal wetlands and swales are known to occur along various portions of the project alignment. A large 1.66 acre seasonal wetland would be impacted by the portion of the alignment accessing pump station #2 off of W. Riego Road (see Figure 3.3-2). This portion of the alignment follows a future road proposed as part of the SPSP development and therefore may be impacted prior to this project. Because the majority of the remaining project alignment occurs within existing roadways, no direct impacts to other seasonal wetlands are anticipated. No seasonal wetlands or similar features are known to occur within those portions of the project alignment that occur outside of existing roadways including the HDD, jack and bore, and pump station locations. Temporary indirect impacts to nearby wetlands and drainages could occur during construction in the form of stormwater runoff or construction fluid spills.

Operation of the proposed project would result in standard maintenance activities to inspect, clean, replace equipment on the constructed conveyance pipelines and sewage pump stations, and there would be no impacts to wetlands or other waters of the U.S.

Project activities that could require Section 404 permits from the USACE include trench excavation and backfill, as well as any necessary modification or replacement to existing culvert or bridge crossing structures. Fill of any wetlands, including areas that could be determined to be jurisdictional by USACE, CDFW, and/or RWQCB, is a significant impact because these areas are considered sensitive habitats by CDFW, provide important ecological functions and values, and can support a number of special-status species. Further coordination with CDFW is needed to identify if any of the creeks or canals would fall under the jurisdiction of Section 1602 of the California Fish and Game Code.

Future Facilities

The future facilities include a pump station and sewer main south of W. Riego Road that would be located in similar agricultural fields as the proposed project pump stations. Further, the future facilities include the construction of a sewer force main along the same alignment as the initial facilities. Therefore, the future facilities would likely result in similar permanent and temporary impacts to wetlands and other waters of the U.S. The future crossings of the NEMDC are expected to occur after the construction of a new overcrossing on W. Riego Road that can integrate design of these elements thereby eliminating the need to use the jack and bore construction technique. There are no known seasonal wetlands or similar features in those portions of the future facilities outside of existing roadways, including the pumping station. Therefore, future facilities would have similar significant impacts to wetlands and other waters of the U.S.

Summary

For all phases of development, construction and installation of proposed project facilities could include the placement of fill material into jurisdictional waters of the United States, including wetlands subject to USACE jurisdiction under the federal CWA, and the potential loss and degradation of wetland habitats protected under state and local regulations. This is considered a ***significant impact***.

Mitigation Measures

The following mitigation measure has been adapted from Mitigation Measure 3.13-2 on pages 3.13-34 to 3.13-35 of the 2009 SPSP EIR. These mitigation measures have been revised to reflect the current conditions and specific scope and impacts of the proposed project.

Mitigation Measure 3.3-1:

The project applicants shall retain a qualified biologist to delineate all wetlands and waters of the United States within the proposed project. The findings shall be documented in

detailed reports and submitted to USACE for verification as part of the formal Section 404 wetland delineation process. The County shall ensure the avoidance of any net loss of wetland function and values for direct and indirect impacts to wetlands subject to federal, state, and/or local jurisdiction, and the project applicants shall secure applicable permits and regulatory approvals described below and shall implement all permit conditions:

- If there would be unavoidable impacts on habitats under USACE jurisdiction for direct and indirect impacts requiring a Section 404 permit, the Section 404 permitting process shall be completed and authorization shall be secured before any fill is placed in jurisdictional wetlands or other waters of the United States. The acreage of jurisdictional wetlands affected shall be replaced so as to ensure no net loss of functions and values, in accordance with USACE regulations. The range of compensation for fill of jurisdictional waters could be less than 1:1 or more than 1:1, depending on the timing, functions, and values of the jurisdictional waters created for compensation. The final compensatory range shall be negotiated with the resources agencies and specified in regulatory permits issued for the proposed project.

- Habitat restoration, rehabilitation, and/or replacement shall be at a location and shall be conducted by feasible methods agreeable to USACE, the County, or other applicable agencies (depending on which agency has permitting authority). Agreement by the applicable agencies shall be obtained before the start of any grading activities that could affect wetland features. Methods for designing and implementing restored, rehabilitated, and replacement wetlands shall be determined by qualified restoration ecologists and geomorphologists to ensure that the desired results are achievable. The design shall include features to maximize the long-term maintenance of functions and values (e.g., fencing) and success criteria. A minimum of 5 years of monitoring shall be required for all restored, rehabilitated, and replacement wetlands. A monitoring plan shall be developed that includes remedial actions to be taken if the success criteria are not met. Before the mitigation design and monitoring plan are finalized, the project applicant(s) shall obtain the approval of USACE, RWQCB, and CDFW, as appropriate, indicating that the planned features are sufficient to replace lost habitat values at equivalent or higher levels. Compensation requirements shall be evaluated in conjunction with any benefits obtained through compliance with the NBHCP.

- A streambed alteration agreement shall be obtained for any unavoidable impacts on habitats regulated under Section 1602 of the California Fish and Game Code, and affected habitats shall be mitigated on a no-net-loss basis. Habitat restoration, rehabilitation, and/or replacement shall be at a location and shall be conducted by methods agreeable to CDFW. Minimization and compensation measures adopted through the Section 1602 permitting process shall be implemented.

- Water quality certification pursuant to Section 401 of the CWA shall be obtained from the RWQCB as required for any USACE permit. Any measures required as part of the issuance of water quality certification shall be implemented.

- A report of waste discharge shall be filed for any waters of the state with the RWQCB.

Significance after Mitigation: Implementation of Mitigation Measure 3.3-1 would ensure that the proposed project would not result in a net loss of wetlands and waters of the U.S. and ensure that current functions and values of onsite wetland habitats are maintained. As a result, impacts wetlands and waters of the U.S. would be reduced to ***less than significant***.

Impact 3.3-2: Implementation of the proposed project could result in the removal of riparian habitat that has the potential to support special-status species in areas within and adjacent to creeks and canals crossed by the project.

Initial Facilities

Impacts to riparian habitat caused by the initial facilities are generally similar to impacts to wetlands and other aquatic features. Riparian habitat adjacent to the project alignment occurs along several of the creeks and canals or ditches. Riparian habitat along the NEMDC and associated freshwater emergent wetland would not be impacted because project construction would use jack and bore techniques at this location. All other riparian habitat occurs adjacent to roadways where the pipeline construction activities would be within the existing roadway and, therefore, would not impact riparian habitat. However, temporary indirect impacts during construction could occur from stormwater runoff or contaminant spills.

Further, the installation project infrastructure could result in the loss of some riparian habitat where construction activities occur at crossings of creeks, canals, and drainages. Although the proposed pipeline would be designed avoid and/or minimize impacts on riparian habitats, construction activities could result in significant impacts on riparian habitat.

Future Facilities

The proposed future facilities would have the same pipeline alignment as the initial facilities and would be adjacent to or cross the same areas of riparian habitat. Therefore, construction of the future facilities would result in a significant impact to riparian habitat; the same as for the initial facilities.

Summary

Potential for direct impacts to riparian habitat could occur from construction along the proposed project alignment for both the initial and future facilities. Further, temporary indirect impacts could also occur during construction from stormwater or spills. Therefore, this is considered a ***significant impact***.

Mitigation Measures

The following mitigation measure has been adapted from Mitigation Measure 3.13-2 of the 2009 SPSP EIR.

Mitigation Measure 3.3-2: Implement Mitigation Measure 3.3-1.

Significance after Mitigation: Implementation of Mitigation Measures 3.3-1 would ensure that project activities do not result in a net loss of riparian habitat as well as ensure that current functions and values of onsite riparian habitats are maintained. As a result, direct and indirect impacts to riparian habitats would be reduced to a ***less-than-significant*** level.

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3.4 Cultural Resources

3.4.1 Introduction

This section addresses potential impacts associated with cultural resources as a result of construction and operation of the proposed project. All other impacts related to cultural resources within the SPSP Area were adequately addressed in the 2009 SPSP EIR as discussed in the Environmental Checklist included as Appendix B in this Focused Tiered EIR. As noted in Appendix B, paleontological resources were adequately addressed in the 2009 SPSP EIR, and no further analysis is required. All relevant information, including applicable environmental and regulatory setting, standards of significance, and mitigation measures identified in Section 3.15 of the 2009 SPSP EIR, are incorporated by reference and summarized below as appropriate.

No letters or comments were received in response to the NOP related to cultural resources (see Appendix C).

3.4.2 Environmental Setting

The 2009 SPSP EIR described the cultural resources setting on pages 3.15-5 through 3.15-10. The analysis was based upon the Cultural Resources Survey Report completed by ECORP Consulting in 2007. The prehistoric and historic environmental setting has not significantly changed since certification of the 2009 SPSP EIR. The 2009 SPSP EIR cultural resources section did not address paleontological resources, but rather they were addressed in the Geology, Soils and Paleontological Resources Section (Section 3.6). The Environmental Checklist prepared for the proposed project determined that impacts relating to paleontological resources were less than significant with implementation of SPSP EIR Mitigation Measure 3.6-6. Therefore, this impact is adequately addressed in the 2009 SPSP EIR and no further analysis was completed. The following discussion is excerpted and summarized from the 2009 SPSP EIR environmental setting.

Prehistoric Setting

The Central Valley region of California was one of the most densely populated areas in North America during prehistoric times. Summaries and overviews of the prehistory of the vicinity can be found in *California Archaeology* (Moratto 1984) and *Summary of the Prehistory of the Lower Sacramento Valley and Adjacent Mountains* (Johnson 1982, as cited in the 2009 SPSP EIR). A more detailed discussion of the broad cultural patterns postulated for Central California can be found in Bennyhoff and Fredrickson (1969, as cited in the 2009 SPSP EIR).

Early work conducted by researchers at then-Sacramento Junior College and the University of California, Berkeley, resulted in the development of the Central California Taxonomic System and a tripartite classification scheme (Early, Middle, and Late Periods). Although these broad temporal periods have been further subdivided (Bennyhoff and Hughes 1987, as cited in the 2009 SPSP EIR), they are briefly described below.

Early Horizon (Windmiller Pattern, ca. 4500–2500 years Before Present [BP]) sites are characterized by extended burials oriented to the west, specialized grave goods, baked clay balls, charmstones, and exotic lithic materials. Year-round settlements with seasonal forays into the foothills resulted in the acquisition of a varied subsistence resource base that was dominated by fish and acorns. However, archaeological evidence shows heavy exploitation of elk, deer, antelope, rabbits, waterfowl, and numerous additional floral and faunal species.

Middle Horizon (Berkeley Pattern, ca. 2500–1500 BP) artifact assemblages show a dramatic increase in the use of mortars and pestles, possibly related to an expanded reliance on acorn as a staple food resource. At sites dated to this period, flexed burials with various orientations are common, as are specialized bone tools, numerous distinctive shell beads and ornaments, and stone tools unique to the period.

Late Horizon (Augustine Pattern, ca. 1400–200 BP) cultural manifestations are distinguished by the presence of shaped mortars and pestles, the use of bow and arrow technology, and the introduction of the harpoon, particularly during early phases of this period. Bone awls are common, there is an increased usage of shell for decorative items, and ground stone artifacts such as tubular pipes and charmstones are commonly encountered. Mortuary practices can be highly variable and include preinterment pit burning, cremations, and flex burials (Bennyhoff and Fredrickson 1969, as cited in the 2009 SPSP EIR).

Ethnographic Setting

The project site is located within the area occupied and used by the Nisenan, or Southern Maidu. The language of the Nisenan, which includes several dialects, is classified within the Maiduan family of the Penutian linguistic stock (Kroeber 1925, Shipley 1978). The western boundary of Nisenan territory was the western bank of the Sacramento River. The eastern boundary was "the line in the Sierra Nevada mountains where the snow lay on the ground all winter" (Littlejohn 1928, as cited in the 2009 SPSP EIR).

Nisenan settlement locations depended primarily on elevation, exposure, and proximity to water and other resources. Permanent villages were usually located on low rises along major watercourses. Wilson and Towne (1978) indicate that village size ranged from three houses to 40 or 50 houses. During expeditions in 1833, fur trader John Work (Maloney 1944, as cited in the 2009 SPSP EIR) indicated that these villages along the Sacramento River were composed of up to 200 individuals. Houses were domed structures covered with earth and tule or grass and they measured approximately 10–15 feet in diameter. Brush shelters were used in the summer and at temporary camps during food-gathering rounds. Larger villages often had semi-subterranean dance houses that were covered in earth and tule or brush and had a central smoke hole at the top and an east-facing entrance. Another common village structure was a granary, which was used for storing acorns (Wilson and Towne 1978). Three Nisenan villages, Wishuna, Totola, and Pusune, were located east of the Sacramento River in the vicinity of the project site (Wilson and Towne 1978).

John Work's California Expedition passed through this area in 1833. His record from August 1833 provides insight into the depopulation of the Sacramento Valley villages caused by disease, which afflicted the natives throughout the interior valley (Maloney 1944, as cited in the 2009 SPSP EIR):

> …The villages which were so populous and swarming with inhabitants when we passed that way in Jary [January] or Febry [February] last seem now almost deserted & have a desolate appearance. The few wretched Indians who remain seem wretched they are lying apparently scarcely able to move, it is not starvation as they have considerable quantities of their winter stock of acorns still remaining. We are unable to learn the malady or its cause. I have given the people orders to avoid approaching the villages lest it be infectious.

The Nisenan occupied permanent settlements from which specific task groups set out to harvest the seasonal bounty of flora and fauna that the rich valley environment provided. The Valley Nisenan economy involved riparian resources, in contrast to that of the Hill Nisenan, whose resource base consisted primarily of acorns and game. The only domestic plant was native tobacco (*Nicotiana* sp.), but many wild species were closely husbanded. The acorn crop from the blue oak (*Quercus douglasii*) and black oak (*Q. kelloggii*) was so carefully managed that its management served as the equivalent of agriculture. Acorns could be stored in anticipation of winter shortfalls. Elk, antelope, deer, rabbit, and salmon were the chief sources of animal protein in the aboriginal diet, but many insect and other animal species were taken when available.

Historic Setting

Beginning in the late 1700s, the Spanish made forays into the Central Valley south of Sacramento; however, it was not until 1808 that Captain Gabriel Moraga explored the Sacramento area. Another expedition, led by Father Narciso Duàan and accompanied by Spanish explorer Luis Argüello, sailed up the Sacramento River to a point near the confluence with the Feather River. On a second voyage, Argüello named the Feather River and may have traveled as far north as Tehama County (Hoover et al. 1990).

Later in 1827, the trapper Jedediah Smith traveled along the Sacramento River and into the San Joaquin Valley. In 1832, John Work traveled south from Oregon to San Francisco, returning north in 1833. Initially, part of Sutter's Mexican land grant of New Helvetia extended north from the confluence of the American and Sacramento Rivers into Sutter County, which was one of the 27 original counties established in California.

Because of seasonal inundation, little settlement occurred in the basin of the American River in Sutter and north Sacramento Counties. Seasonal agriculture and cattle grazing were the primary industries during the historic period in the present-day Sacramento and Sutter County region. Regional ranching originated on the New Helvetia rancho in the early 1840s. The Gold Rush precipitated growth in agriculture and ranching, as ranchers and farmers realized handsome

returns from supplying food and other goods to miners. Frequent floods, however, plagued the residents of the region and posed a significant threat to the viability of agricultural interests and further settlement.

Initial efforts at flood control were generally uncoordinated and consisted of small levees and drains constructed by individual landowners. These efforts proved insufficient to protect cultivated land, and much of the Natomas area (a part of the larger American River Basin) flooded regularly (Dames & Moore 1994, as cited in the 2009 SPSP EIR). In 1861, the California legislature created the State Board of Swampland Commissioners to oversee reclamation of swamp and overflow lands. The State Board of Swampland Commissioners established 32 districts that attempted to enclose large areas with natural levees. Lack of cooperation among the landowners in the districts led to chronic financial crises.

When the legislature terminated the State Board of Swampland Commissioners in 1866, responsibility for swamp and overflow land fell to the individual counties. Many counties offered incentives to landowners for reclaiming agriculturally unproductive land. If a landowner could certify that he had spent at least $2 per acre in reclamation, the county would refund the purchase price of the property to the owner. Speculators took advantage of this program and a period of opportunistic and often-irrational levee building followed (McGowan 1961, Thompson 1958, as cited in the 2009 SPSP EIR).

In the early part of the 20th century, the legislature established the California Reclamation Board (known today as the Central Valley Flood Protection Board) to exercise jurisdiction over reclamation districts and levee plans. During that time, the State of California approved and began implementation of the Sacramento River Flood Control Project (SRFCP). The ambitious project included the construction of levees, weirs, and bypasses along the river to channel floodwaters away from population centers. Under the SRFCP, new reclamation districts were created, including Reclamation District 1000 (RD 1000), which consisted of approximately 55,000 acres in the Natomas area. RD 1000 was largely controlled by the Natomas Company, which was formed in 1851 in Sacramento County to supply water for placer mining and irrigation. It later became involved in dredging for gold and expanded its water supply business, and still later became involved in land reclamation in part as a rebuttal of criticism that farmland was being destroyed by the company's gold dredging activities (Dames & Moore 1994, as cited in the 2009 SPSP EIR).

Method of Analysis and Findings

Archival Review

A review of previously conducted research was done by the Northeast Information Center (NEIC), Northwest Information Center (NWIC), and North Central Information Center (NCIC) as part of the Sutter Pointe EIR in 2008. Review of these findings determined that 232 cultural resources studies and evaluations had been conducted, both within the project site and for the off-

site improvements, and resulted in an intensive systematic inventory of approximately 90% of the 7,258-acre project site. The majority of the remaining SPSP area, including the proposed pipeline alignment and pump station locations, was surveyed by ECORP in 2007 and EDAW in 2008. Previous research resulted in the documentation of 12 separate cultural resources sites and one rural historic landscape site. Nine of the sites are located within the SPSP area, including three sites containing historic-era buildings/structures (EC-05-23, EC-07-73, and EC-07-08) that have yet to be evaluated for significance and are pending the results of further archival research and documentation to complete the evaluation process. The remaining resources outside the SPSP area include two within the proposed project force main alignment: the National Register eligible RD 1000 Historic Landscape, and a segment of Elkhorn Blvd., a contributing element of RD 1000.

NCIC staff at Sacramento State University conducted an updated records search of the proposed force main alignment on November 4, 2014 (RS# SAC-14-139). Records were accessed by reviewing the Rio Linda, California 7.5-minute quadrangle base map. The records search included a 1/2-mile radius around the proposed area in order to: (1) determine whether known cultural resources had been recorded within or adjacent to the proposed project area; (2) assess the likelihood of unrecorded cultural resources based on historical references and the distribution of environmental settings of nearby sites; and (3) develop a context for identification and preliminary evaluation of cultural resources.

Included in the review were the California Inventory of Historical Resources (Office of Historic Preservation [OHP], 1976) and the Historic Properties Directory (HPD; OHP, 2012). The HPD includes listings of the California Register of Historical Resources and National Register of Historic Places, and the most recent listing of the California Historical Landmarks and California Points of Historical Interest. The records search also included the findings of the Caltrans Historic Bridge Inventory (August 2013).

The results of the records searches indicate that 58 cultural resources studies have been previously conducted within the 1/2-mile records search radius around the proposed project alignment, including 19 investigations intersecting portions of the proposed force main alignment. The NCIC identified 35 cultural resources previously recorded within the updated records search radius for the project area, including one (P-34-0739, Sorrento Road, ineligible for listing) within the project alignment. P-34-000271, which appears to be a prehistoric village site, was identified outside the proposed project, approximately ¼ mile west of Sorento Road.

Field Survey Methodology and Results

As noted above, the current proposed project areas have been previously surveyed by ECORP in 2007 and EDAW in 2008 as part of the 2009 SPSP EIR. Those surveys documented five new historic structures within the project site, but these resources were not present within the current project footprint. The 2008 survey re-documented Elkhorn Blvd. (P-34-886H) and confirmed its previous eligibility as a contributor to RD 1000 Historic Landscape District.

ESA archaeologist R. Scott Baxter completed the reconnaissance field survey of the pipeline alignment on November 10, 2014, re-identifying previously documented resources and spot checking areas of exposed native ground surface for the presence of surficial archaeological resources. There are a number of historic structures immediately adjacent to the roadways, but project construction, which is solely within the road right of way, is not anticipated to result in an impact to these resources. A modern segment of Elkhorn Blvd., noted above, was identified as intersecting the proposed force main alignment.

3.4.3 Regulatory Setting

State

The State implements provisions in CEQA through its statewide comprehensive cultural resources surveys and preservation programs. The California OHP, as an office of the California Department of Parks and Recreation, oversees adherence to CEQA regulations. The OHP also maintains the California Historic Resources Inventory. The State Historic Preservation Officer (SHPO) is an appointed official who implements historic preservation programs within the State's jurisdiction. Typically, a resource must be more than 50 years old to be considered as a potential historical resource. The OHP advises recordation of any resource 45 years or older, since "there is commonly a five year lag between resource identification and the date that planning decisions are made" (OHP, 1995).

California Environmental Quality Act

CEQA (*codified at Public Resources Code sec 21000 et seq.)* is the principal statute governing environmental review of projects occurring in the State. CEQA requires lead agencies to determine if a project would have a significant effect on historical or unique archaeological resources. The Guidelines recognize that a historical resource includes: (1) a resource in the California Register; (2) a resource included in a local register of historical resources, as defined in the California Public Resources Code (PRC) Section 5020.1(k) or identified as significant in a historical resource survey meeting the requirements of PRC Section 5024.1(g); and (3) any object, building, structure, site, area, place, record, or manuscript which a lead agency determines to be historically significant or significant in the architectural, engineering, scientific, economic, agricultural, educational, social, political, military, or cultural annals of California by the lead agency provided the lead agency's determination is supported by substantial evidence in light of the whole record.

If a lead agency determines that an archaeological site is a historical resource, the provisions of Section 21084.1 of CEQA and Section 15064.5 of the *CEQA Guidelines* apply. If an archaeological site does not meet the criteria for a historical resource contained in the *CEQA Guidelines*, then the site may be treated in accordance with the provisions of CEQA Section 21083, which is a unique archaeological resource. As defined in Section 21083.2 of CEQA a "unique" archaeological resource is an archaeological artifact, object, or site, about which it can

be clearly demonstrated that without merely adding to the current body of knowledge, there is a high probability that it meets any of the following criteria:

- Contains information needed to answer important scientific research questions and there is a demonstrable public interest in that information;
- Has a special and particular quality such as being the oldest of its type or the best available example of its type; or,
- Is directly associated with a scientifically recognized important prehistoric or historic event or person.

CEQA Guidelines note that if an archaeological resource is neither a unique archaeological nor a historical resource, the effects of the Project on those resources shall not be considered a significant effect on the environment (*CEQA Guidelines* Section 15064.5(c)(4)).

California Register of Historical Resources

The California Register of Historical Resources (California Register) is "an authoritative listing and guide to be used by State and local agencies, private groups, and citizens in identifying the existing historical resources of the State and to indicate which resources deserve to be protected, to the extent prudent and feasible, from substantial adverse change" (PRC Section 5024.1[a]). The criteria for eligibility for the California Register are based upon National Register criteria (PRC Section 5024.1[b]), as defined above. Certain resources are determined by the statute to be automatically included in the California Register, including California properties formally determined eligible for, or listed in, the National Register.

To be eligible for the California Register, a cultural resource must be significant at the local, State, and/or federal level under one or more of the following four criteria:

1. Is associated with events that have made a significant contribution to the broad patterns of California's history and cultural heritage;
2. Is associated with the lives of persons important in our past;
3. Embodies the distinctive characteristics of a type, period, region, or method of construction, or represents the work of an important creative individual, or possesses high artistic values; or
4. Has yielded, or may be likely to yield, information important in prehistory or history.

A resource eligible for the California Register must be of sufficient age, and retain enough of its historic character or appearance (integrity) to convey the reason for its significance.

Assembly Bill 52

In September of 2014, the California Legislature passed Assembly Bill (AB) 52, which added provisions to the Public Resources Code regarding the evaluation of impacts on tribal cultural

resources under CEQA, and consultation requirements with California Native American tribes. In particular, AB 52 now requires lead agencies to analyze project impacts on "tribal cultural resources," separately from archaeological resources (PRC Section 21074; 21083.09), in recognition that archaeological resources have cultural values beyond their ability to yield data important to prehistory or history (Criterion 4/D). The Bill defines "tribal cultural resources" in a new section of the PRC Section 21074. AB 52 also requires lead agencies to engage in additional consultation procedures with respect to California Native American tribes (PRC Section 21080.3.1, 21080.3.2, 21082.3). Finally, AB 52 requires the Office of Planning and Research to update Appendix G of the CEQA Guidelines by July 1, 2016 to provide sample questions regarding impacts to tribal cultural resources (PRC Section 21083.09).

The County initiated AB52 consultation through distribution of letters to the Native American tribes provided by the NAHC on January 21, 2016. The County initiated consultation with the Shingle Springs Rancheria as a result of their response to the letter, but no further consultation has been undertaken by the County.

Other Provisions of California Public Resources Code

Several sections of the PRC protect paleontological resources. PRC Section 5097.5 prohibits "knowing and willful" excavation, removal, destruction, injury, and defacement of any paleontological feature on public lands (lands under state, county, city, district, or public authority jurisdiction, or the jurisdiction of a public corporation), except where the agency with jurisdiction has granted permission.

Section 7050.5 of the Health and Safety Code protects human remains by prohibiting the disinterring, disturbing, or removing of human remains from any location other than a dedicated cemetery. Section 5097.98 of the PRC (and reiterated in CEQA Section 15064.59 [e]) also states that in the event of the accidental discovery or recognition of any human remains in any location other than a dedicated cemetery, the following steps shall be taken:

1) There shall be no further excavation or disturbance of the site or any nearby area reasonably suspected to overlie adjacent human remains until:

   A) The coroner of the county in which the remains are discovered must be contacted to determine that no investigation of the cause of death is required, and

   B) If the coroner determines the remains to be Native American:

      1. The coroner shall contact the Native American Heritage Commission within 24 hours.

      2. The Native American Heritage Commission shall identify the person or persons it believes to be the most likely descended from the deceased Native American.

      3. The most likely descendent may make recommendations to the landowner or the person responsible for the excavation work, for means of treating or disposing of,

with appropriate dignity, the human remains and any associated grave goods as provided in PRC Section 5097.98, or

2) Where the following conditions occur, the landowner or his authorized representative shall rebury the Native American human remains and associated grave goods with appropriate dignity on the property in a location not subject to further subsurface disturbance.

   A) The Native American Heritage Commission is unable to identify a most likely descendent or the most likely descendent failed to make a recommendation within 48 hours after being notified by the commission.

   B) The descendant identified fails to make a recommendation; or,

   C) The landowner or his authorized representative rejects the recommendation of the descendant, and the mediation by the Native American Heritage Commission fails to provide measures acceptable to the landowner.

Local

Placer County General Plan

The following goals and policies from the Placer County General Plan (Placer County, 2013) related to cultural resources are applicable to the proposed project:

Goal 5.D: To identify, protect, and enhance Placer County's important historical, archaeological, paleontological, and cultural sites and their contributing environment.

- **Policy 5.D.3:** The County shall solicit the views of the Native American Heritage Commission, State Office of Historic Preservation, North Central Information Center, and/or the local Native American community in cases where development may result in disturbance to sites containing evidence of Native American activity and/or to sites of cultural importance.

- **Policy 5.D.6:** The County shall require that discretionary development projects identify and protect from damage, destruction, and abuse, important historical, archaeological, paleontological, and cultural sites and their contributing environment. Such assessments shall be incorporated into a Countywide cultural resource data base, to be maintained by the Division of Museums.

Sutter County 2030 General Plan

The following goals and policies from the Sutter County 2030 General Plan (Sutter County, 2011) related to cultural resources are applicable to the proposed project:

GOAL ER 8: Identify, protect, and enhance Sutter County's important cultural and paleontological resources to increase awareness of the County's heritage.

- **Policy ER 8.1:** Identification. Identify cultural resources, which include prehistoric, historic, paleontological, and archeological resources, throughout the County to provide adequate protection of these resources.

- **Policy ER 8.2:** Preservation. Ensure the preservation of significant cultural and paleontological resources, including those recognized at the national, state, and local levels.

- **Policy ER 8.**5: Consultation. Consult with the appropriate organizations and individuals early in the development process (e.g., Information Centers of the California Historical Resources Information System, Native American Heritage Commission, and Native American groups and individuals) to minimize potential impacts to cultural resources.

Sacramento County 2030 General Plan

The following goals, objectives, and policies from the Sacramento County 2030 General Plan Conservation Element Cultural Resources Section (Sacramento County, 2011) related to cultural resources are applicable to the proposed project:

GOAL: Promote the inventory, protection and interpretation of the cultural heritage of Sacramento County, including historical and archaeological settings, sites, buildings, features, artifacts and/or areas of ethnic historical, religious or socioeconomical importance.

- **Objective:** Attention and care during project review and construction to ensure that cultural resource sites, either previously known or discovered on the project site, are properly protected with sensitivity to cultural and ethnic values of all affected.

- **Policy CO-150:** Utilize local, state and national resources, such as the NCIC, to assist in determining the need for a cultural resources survey during project review.

- **Policy CO-152:** Consultations with Native American tribes shall be handled with confidentiality and respect regarding sensitive cultural resources on traditional tribal lands.

- **Policy CO-155:** Native American burial sites encountered during preapproved survey or during construction shall, whenever possible, remain in situ. Excavation and reburial shall occur when in situ preservation is not possible or when the archeological significance of the site merits excavation and recording procedure. On-site reinterment shall have priority. The project developer shall provide the burden of proof that off site reinterment is the only feasible alternative. Reinterment shall be the responsibility of local tribal representatives.

- **Policy CO-156:** The cost of all excavation conducted prior to completion of the project shall be the responsibility of the project developer.

- **Policy CO-157:** Monitor projects during construction to ensure crews follow proper reporting, safeguards, and procedures.

- **Policy CO-158:** As a condition of approval of discretionary permits, a procedure shall be included to cover the potential discovery of archaeological resources during development or construction.

3.4.4 Impacts and Mitigation Measures

Significance Criteria

For the purpose of this analysis, the relevant standards of significance from the 2009 SPSP EIR have been used to determine whether implementing the proposed project would result in a significant impact. These standards of significance are also based on the Office of Public Records plans for changes to Appendix G of the State CEQA Guidelines relative to AB 52 explained previously in the regulatory setting section. An impact to cultural resources is considered significant if implementation of the proposed project would:

- Cause a substantial adverse change in the significance of an archaeological resource pursuant to CEQA Guidelines Section 15064.5;
- Disturb any human remains, including those interred outside of formal cemeteries; or
- Cause a substantial adverse change in the significance of a tribal cultural resource as defined in PRC Section 21074;

Impacts Adequately Analyzed in the SPSP EIR or not Applicable to the Project

As determined in the Environmental Checklist (Appendix B) prepared for the proposed project, impacts relating to paleontological resources were determined to be less than significant with implementation of SPSP EIR Mitigation Measure 3.6-6. This mitigation measure would reduce potential damage or destruction to unidentified paleontological resources during project construction to a less-than significant level. Therefore, this impact is adequately addressed in the 2009 SPSP EIR and no further analysis is required. This issue will not be addressed in the Tiered Focused EIR.

Proposed Project Impacts and Mitigation Measures

Table 3.4-1 provides a summary of the impacts identified for the proposed project. The level of significance after any mitigation measures is also presented. Each of these impacts is discussed in more detail below.

TABLE 3.4-1.
PROPOSED PROJECT IMPACT SUMMARY – CULTURAL RESOURCES

Impact	Initial Facilities		Future Facilities	
	Before Mitigation	After Mitigation	Before Mitigation	After Mitigation
3.4-1: Implementation of the proposed project could cause a substantial adverse change in the significance of a unique archaeological resource, including human remains.	S	LS	S	LS
3.4-2: Implementation of the proposed project could disturb human remains, including those interred outside of formal cemeteries.	S	LS	S	LS
3.4-3: Implementation of the proposed project could cause a substantial adverse change in the significance of a tribal cultural resource as defined in PRC Section 21074.	S	LS	S	LS

LS = Less than Significant Impact
S = Significant Impact

Impact 3.4-1: Implementation of the proposed project could cause a substantial adverse change in the significance of a unique archaeological resource, including human remains.

All Facilities

The proposed project would result in a significant impact if the project could cause a substantial adverse change to an archaeological resource through physical demolition, destruction, relocation, or alteration of the resource. No archaeological features or artifacts were identified in the area of the proposed initial facilities. Based on the nearby presence of P-34-000271, a prehistoric village site approximately ¼ mile west of the alignment, and the proximity of local creeks and waterways that would have attracted prehistoric native peoples, the discovery of archaeological materials during ground disturbing activities cannot be entirely discounted. The possibility remains for earth moving activities during construction and installation of the pipeline and pump station facilities to disturb previously unknown archaeological resources, including human remains. The inadvertent discovery of and damage to archaeological resources during project construction could be a significant impact.

Summary

For all phases of development, construction and installation of proposed project facilities could result in inadvertent discovery of archaeological resources resulting in a ***significant impact***.

Mitigation Measures

Mitigation Measure 3.4-1: Implement Mitigation Measure 3.15-2 on page 3.15-24 of 2009 SPSP EIR specific for all on- and off-site elements.

To reduce impacts on potentially undiscovered cultural resources, the project applicant(s) of all project phases shall do the following:

- Before the start of construction activities, the project applicant(s) of all project phases shall retain a qualified archaeologist to conduct training for construction workers, to educate them about the possibility of encountering buried cultural resources and inform them of the proper procedures should resources be encountered.

- The project applicant(s) of all project phases, including off-site elements, shall retain a qualified archaeologist who is trained in the identification of buried deposits to be present for all ground-disturbing activities within 1,000 feet of Curry Creek, which is located within Phase D and Phase 4 of project development.

- The project applicant(s) of all project phases shall temporarily suspend all ground-disturbing activity if previously undocumented archaeological materials (e.g., remains of historic buildings or structures; deposits or scatters of historic artifacts; or prehistoric artifacts such as stone tool flaking debris, mortars, pestles, shell, or bone) are encountered during project construction. At that time, the project applicant(s) shall retain a qualified archaeologist. Construction activities shall be suspended within a 100-foot radius of the find or a distance determined by a qualified archaeologist to be appropriate based on the potential for disturbance of additional resource-bearing soils. The archaeologist shall conduct a field investigation of the specific site and recommend specific treatment measures deemed necessary to protect or recover any cultural resources concluded by the archaeologist to represent significant or potentially significant resources as defined by CEQA. Specific treatment measures include but are not limited to avoiding the resource or conducting data recovery and recordation. The applicant(s) shall implement all of the archaeologist's feasible recommendations to the satisfaction of the County before construction resumes in the area where cultural materials were discovered.

Significance after Mitigation: Implementation of Mitigation Measure 3.4-1 would ensure that the proposed project would not result in inadvertent damage or destruction to archaeological resources. As a result, impacts to archaeological resources would be reduced to ***less than significant***.

Impact 3.4-2: Implementation of the proposed project could disturb human remains, including those interred outside of formal cemeteries.

All Facilities

As described above in Impact 3.4-1, while no prehistoric archaeological resources were identified during the 2009 SPSP EIR effort or the survey conducted by ESA for the proposed pump stations and force mains, it is possible that previously undiscovered human remains could be unearthed

and damaged or destroyed during project-related ground disturbing activities, causing damage to or destruction of such remains resulting in a significant impact.

Summary

For all phases of development, construction and installation of proposed project facilities could result in inadvertent discovery of archaeological resources, including human remains, resulting in a ***significant impact***.

Mitigation Measures

Mitigation Measure 3.4-2: Implement 2009 SPSP EIR Mitigation Measure 3.15-3 for all on- and off-site elements of the SPSP.

In accordance with the California Health and Safety Code, if human remains are uncovered during ground disturbing activities, including those associated with off-site improvements, the project applicant(s) shall immediately halt potentially damaging excavation in the area of the burial and notify the County coroner and a professional archaeologist to determine the nature of the remains. The coroner is required to examine all discoveries of human remains within 48 hours of receiving notice of a discovery on private or public lands (Health and Safety Code Section 7050.5[b]). If the coroner determines that the remains are those of a Native American, he or she must contact the NAHC by phone within 24 hours of making that determination (Health and Safety Code Section 7050[c]).

After the coroner's findings are complete, the project applicant(s), an archaeologist, and the NAHC-designated Most Likely Descendant (MLD) shall determine the ultimate treatment and disposition of the remains and take appropriate steps to ensure that additional human interments are not disturbed. The responsibilities for acting on notification of a discovery of Native American human remains are identified in Section 5097.9 of the California Public Resources Code.

Upon the discovery of Native American remains, the procedures above regarding involvement of the County coroner, notification of the NAHC, and identification of an MLD shall be followed. The applicant(s) shall ensure that the immediate vicinity (according to generally accepted cultural or archaeological standards and practices) is not damaged or disturbed by further development activity until consultation with the MLD has taken place. The MLD shall have at least 48 hours after being granted access to the site to inspect the site and make recommendations. A range of possible treatments for the remains may be discussed: nondestructive removal and analysis, preservation in place, relinquishment of the remains and associated items to the descendants, or other culturally appropriate treatment.

As suggested by Assembly Bill (AB) 2641 (Chapter 863, Statutes of 2006), the concerned parties may extend discussions beyond the initial 48 hours to allow for the discovery of additional remains. AB 2641(e) includes a list of site protection measures and states that the applicant(s) shall comply with one or more of the following requirements:

- Record the site with the NAHC or the appropriate Information Center.
- Use an open-space or conservation zoning designation or easement.
- Record a document with the county in which the property is located.

The project applicant(s) or its authorized representative shall rebury the Native American human remains and associated grave goods with appropriate dignity on the property in a location not subject to further subsurface disturbance if the NAHC is unable to identify an MLD or if the MLD fails to make a recommendation within 48 hours after being granted access to the site. The applicant(s) or its authorized representative may also reinter the remains in a location not subject to further disturbance if it rejects the recommendation of the MLD and mediation by the NAHC fails to provide measures acceptable to the landowner. Ground disturbance in the zone of suspended activity shall not recommence without authorization from the archaeologist.

Significance after Mitigation: Implementation of Mitigation Measure 3.4-2 would ensure that the proposed project would not result in inadvertent damage or destruction to human remains. As a result, impacts to human remains would be reduced to ***less than significant***.

Impact 3.4-3: Implementation of the proposed project could cause a substantial adverse change in the significance of a tribal cultural resource as defined in PRC Section 21074.

All Facilities

Construction of the proposed project could result in a significant impact if there would be a substantial adverse change to a tribal cultural resource identified by a Native American tribe. As described previously, the County has initiated consultation with the Shingle Springs Rancheria regarding potential impacts to cultural resources pursuant to AB 52. The tribe had no specific concerns over the project. Further, archival review and field surveys for the proposed project did not indicate the presence of any known sites or prehistoric archaeological sites that would be sacred or important to local tribes.

Summary

For all phases of development, construction and installation of proposed project facilities could result in inadvertent discovery of archaeological resources, including potential tribal cultural resources, resulting in a ***significant impact***.

Mitigation Measure

Mitigation Measure 3.4-3: Implement Mitigation Measures 3.4-1 and 3.4-2.

Significance after Mitigation: Implementation of Mitigation Measure 3.4-3 would ensure avoidance measures or the appropriate treatment of archaeological resources would be required if accidentally discovered during project construction and that the proposed project would not result in inadvertent damage or destruction to archaeological resources, including potential tribal cultural resources. As a result, impacts to tribal cultural resources would be reduced to ***less than significant***.

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3.5 Wastewater Conveyance and Treatment

3.5.1 Introduction

This section addresses the proposed project's potential to impact the capacity of wastewater conveyance within SASD UNWI system and the treatment capacity of the Regional San's SRWTP. All other impacts related to utilities were adequately addressed in the 2009 SPSP EIR as discussed in the Environmental Checklist included as Appendix B in this Focused Tiered EIR. All relevant information, including applicable environmental and regulatory setting, standards of significance, and mitigation measures identified in Section 3.10.3 of the 2009 SPSP EIR, are incorporated by reference and summarized below as appropriate.

Comments received in response to the NOP (see Appendix C) include a letter from the Regional San requesting that the EIR address onsite and offsite impacts associated with construction of sanitary sewer facilities that would provide service to the subject project.

3.5.2 Environmental Setting

The SPSP is located in south Sutter County (County) along the Highway 99/70 corridor and immediately adjacent to and contiguous with the Sacramento County line (see Figure 2-1 in Chapter 2 – Project Description). The SPSP area is not presently served by any municipal wastewater collection and treatment systems. Existing residential, industrial, and commercial uses within the SPSP area are served by individual on-site wastewater disposal (septic tank) systems. The County Public Works Department provides wastewater service to the communities of Robbins and Rio Ramaza, including sanitary sewer collection systems and wastewater treatment facilities. The remainder of the unincorporated County is served by privately owned septic systems on individual parcels.

Current flows to the UNWI come from unincorporated communities and cities within Sacramento, including Rio Linda, Elverta, City of Citrus Heights, Orangevale, and parts of Fair Oaks and Carmichael. Regional San accepts and treats wastewater from its Contributing Members and Contracting Agencies at the SRWTP located near the community of Freeport. After treatment of wastewater from Contributing Members and Contracting Agencies, Regional San's treated wastewater is discharged into the Sacramento River just downstream of the Freeport Bridge. Within the SPSP area, the County is responsible for the development of the necessary regulatory framework to provide sewer service and the appropriate rate and fee structure to cover the costs of operation and maintenance of the system. A County Service Area (CSA) or other county or public agency such as a Community Services District (CSD) will be created to enable the County to own, operate, and maintain the local and trunk sanitary sewer collection within the SPSP area. The County envisions that the SPSP area will become an incorporated city in the future. At such time, the County's sewer collection and conveyance system may be transferred to that party of interest.

In 2009, the County and Regional San entered into an agreement-in-principal, formally known as the "Principles of Agreement," to convey the wastewater flows generated within the SPSP area to SASD's UNWI at the intersection of W. 6th Street and Elkhorn Blvd. From this location, Regional San would convey the wastewater flows to the SRWTP located near the community of Freeport. The Principles of Agreement set forth the basic terms and conditions under which Regional San would extend service to the SPSP area. These terms and conditions established the framework for the method and means of service, the anticipated flow rates, the cost of service, the required facilities and their costs, regulatory compliance, and other business arrangements.

Before Regional San can provide wastewater service within the SPSP area, the County and Regional San will need to enter into a contract for service that would allow Regional San to provide services to the County.

The proposed contract for services has been the subject of a year-long, multi-agency negotiation that started with the fundamental terms and conditions of service as outlined in the Principles of Agreement. The proposed contract builds on the framework set forth in the Principles of Agreement and addresses the various legal, operational and administrative details of providing wastewater services to the SPSP area. The proposed contract for services, formally known as the, "Wastewater Services by Contract and Operating Agreement," ("Agreement") is a three-party contract between Regional San, SASD and the County to extend wastewater services to the SPSP area and includes the following responsibilities of the parties:

a) The County would be responsible for the design, construction, financing and ownership of all wastewater facilities within the SPSP area (including the off-site force mains),

b) SASD would be responsible for operation and maintenance of said facilities utilizing their operational resources and management expertise, and

c) Regional San would accept the wastewater flows generated within the SPSP area at the proposed point of connection and convey said flows to the SRWTP where they will treat and then discharge the flows into the Sacramento River under and consistent with the terms and conditions of its NPDES Waste Discharge Permit.

It is important to note that the Agreement contemplates that the County will be responsible to pay all applicable rates of SASD and all applicable rates and fees of Regional San for each of the County's users that contribute flow to SPSP system and discharges into the Regional San system.

While the maximum treatment capacity at the SRWTP is 218 mgd, the maximum discharge limit of the current NPDES permit for the SRWTP prohibits a discharge in excess of 181 mgd of treated effluent into the Sacramento River, requiring Regional San to provide onsite treated effluent storage at the SRWTP prior to discharge. According to the 2020 SRWTP Master Plan, the permitted capacity was expected to be reached by 2010 (Carollo Engineers, 2008). However, while there was a significant increase in new development over the last fifteen years, the average

dry weather flows to the SRWTP have consistently decreased from 155 mgd in 2000 to 106 mgd in 2014 (MacKay & Somps, 2015).

The rate of decrease in Average Dry Weather Flow (ADWF) from existing customers is expected to slow over time as a larger percentage of existing customers are retrofitted with low flow devices. Over time, new flows generated within the region from new development will counteract the declining trend in ADWF. As these new connections are realized over the coming decades, in aggregate, they will contribute more flow to the SRWTP. However, future new connections will be built under more stringent building codes that will mandate the use of low flow fixtures and existing connections will be retrofitted over time with water saving devices, continuing the downward trend in per capita wastewater generation rates.

3.5.3 Regulatory Setting

The project site includes the proposed pump stations and force mains alignment that begins within the southern portion of Sutter County and ends at the junction with the UNWI in the community of Rio Linda, within the northern portion of Sacramento County, California. The applicable rules, regulations, policies, and/or goals associated with wastewater conveyance and treatment are described below.

Federal

No federal plans, policies, regulations, or laws related to wastewater conveyance and treatment are applicable to the proposed project.

State

National Pollutant Discharge Elimination System Permits

The NPDES permit system was established in the CWA to regulate municipal and industrial point discharges to surface waters of the U.S. Each NPDES permit for point discharges contains limits on allowable concentrations of pollutants contained in discharges. Sections 401 and 402 of the CWA contain general requirements regarding NPDES permits. Section 307 of the CWA describes the factors that the EPA must consider in setting effluent limits for priority pollutants. In California, the CWA NPDES permit system is administered by the Regional Water Quality Control Boards (RWQCBs).

- The CWA requires wastewater dischargers to obtain a permit that establishes effluent limitations and specifies monitoring and reporting requirements. The NPDES program requires wastewater dischargers to regulate non-domestic wastes discharged to sewers through activities such as pretreatment programs and sewer use ordinances. NPDES permits include the following terms and conditions:
- Effluent discharge limitations;
- Prohibitions;

- Receiving water limitations;
- Compliance monitoring and reporting requirements; and
- Other provisions

The SRWTP presently operates and discharges treated effluent to the Sacramento River under the requirements of an NPDES permit issued by the Central Valley Regional Water Quality Control Board (CVRWQCB) as amended Waste Discharge Requirements/NPDES Permit CA0077682, adopted on December 9, 2010, amended by Order R5-2011-0083 on December 1, 2011, Order R5-2013-0124 on October 4, 2013, Orders R5-2014-0102 and R5-2014-0103 on August 8, 2014, Order R5-2014-0122 on October 9, 2014, and Order R5-2015-0097 on July 31, 2015. The Regional San is currently in the process of developing the Eco-Water Project to address these orders to meet water quality discharge requirements and to ensure future capacity to treat wastewater from its Contributing Members and Contracting Agencies.

Under the CWA, U.S. EPA was required to establish the National Pretreatment Program, part of the NPDES Program, to prevent the discharge of toxic pollutants into a publicly owned treatment works that would interfere with or, pass through untreated to rivers, lakes or waters of the United States, or otherwise be incompatible with such treatment works. Each publicly owned treatment works discharging over 5 mgd is required to develop a local pretreatment program to enforce national pretreatment standards. U.S. EPA is responsible for enforcing the National Pretreatment Program at the federal level. In California, Pretreatment Program enforcement is the responsibility of the RWQCBs. The Regional San implements a pretreatment program through the Wastewater Source Control Section.

Regional and Local Plans, Policies, Regulations, and Ordinances

Sutter County General Plan

The following goals and policies from the Sutter County General Plan regarding wastewater conveyance facilities are applicable to the proposed project.

Goal I 2 Wastewater. Ensure efficient and safe collection, treatment, and disposal of wastewater, biosolids, and septage.

- **Policy I 2.1 Availability.** Require new development to study, coordinate, and plan the provision of wastewater services to support the new development and demonstrate the availability of long-term, safe, and reliable wastewater collection, treatment, and disposal.
- **Policy I 2.7 Provision of Services.** Minimize County operated wastewater systems serving urbanized areas. Transfer County operated wastewater systems in urban areas to incorporated cities or public community service districts where and when feasible and beneficial to the customers.

- **Policy I 2.9 Connection to Publicly Owned System.** Connect existing developed areas to publicly owned treatment works where practical.

Sacramento County General Plan

The following goals and policies from the Sacramento County General Plan regarding wastewater conveyance facilities are applicable to the proposed project.

Goal: Wastewater Collection and Treatment. Safe, efficient, and environmentally sound public sewer system and treatment facility serving all urban development.

Growth and System Expansion. Treatment plant, regional interceptors and trunk system expansion completed prior to construction in urban expansion areas and/or flows reaching critical capacity limits.

- **Policy PF-6:** Interceptor, trunk lines and flow attenuation facilities shall operate within their capacity limits without overflowing.

- **Policy PF-7:** Although sewer infrastructure will be planned for full urbanization consistent with the Land Use Element, an actual commitment of additional sewer system capacity will be made only when the land use jurisdiction approves development to connect and use the system.

- **Policy PF-8:** Do not permit development which would cause sewage flows into the trunk or interceptor system which would cause an overflow.

- **Policy PF-10:** Development along corridors identified by the Districts in their planning documents as locations of future sewerage conveyance facilities shall incorporate appropriate easements as a condition of approval.

Extension of Sewer System: Established limits on extension of public sewer service in the unincorporated area to ensure long-term availability of conveyance and treatment capacity, cost-effective use of revenues and support open space preservation objectives.

- **Policy PF-11:** The County shall not support extension of the regional interceptor system to provide service to areas within the unincorporated County which are beyond the Urban Service Boundary. This shall not prohibit the County from supporting the extension of the regional interceptor system to areas outside the USB which are being proposed for annexation to a city.

- **Policy PF-13:** Public sewer systems shall not extend service into agricultural-residential areas outside the urban policy area unless the Environmental Health Department determines that there exists significant environmental or health risks created by private disposal systems serving existing development and no feasible alternatives exist to public sewer service.

Wastewater Service Agreement

The Agreement requires that SPSP sewer facilities to be designed and constructed pursuant to plans and specifications designated in the 2016 SASD Sewer Ordinance and 2013 Standards and Specifications and approved by SASD and Regional San. The wastewater conveyance system is required to meet SASD, Sutter County, Sacramento County, and Regional San design criteria to safely contain and convey wastewater flows and control the content of wastewater through the SASD and Regional San facilities.

3.5.4 Impacts and Mitigation Measures

Significance Criteria

For the purpose of this analysis, the relevant standards of significance from the 2009 SPSP EIR have been modified to determine whether implementing the proposed project would result in a significant impact. These standards of significance are also based on Appendix G of the State CEQA Guidelines. An impact on wastewater conveyance and treatment capacity is considered significant if implementation of the proposed project would:

- Exceed existing conveyance capacity; or,
- Result in a determination by the wastewater treatment provider that serves or may serve the project that it has inadequate capacity to serve the project's projected demand in addition to the provider's existing commitments.

Methodology

This section assesses the potential for the proposed project to affect wastewater conveyance and treatment capacity within Regional San treatment plant. This section uses the information provided in the *Regional San Capacity Analysis* (MacKay & Somps, 2015: Appendix D) and the Wastewater Service Agreement between SASD, Regional San, and Sutter County to analyze the proposed project's impact on conveyance and treatment capacity. The capacity analysis used SASD and Regional San standards and specifications based on land use types to derive wastewater generation within the project site.

The proposed project identifies the area of initial development within Phase 1 of the SPSP area as a portion of the 2,100± acres of lands currently within Zones 1 and 2. Land uses within these zones would include low, medium and high density residential parcels, schools, parks and open space, drainage detention basins, commercial sites, and employment centers. The total acreage of development planned to be served by the proposed project initial facilities is approximately 330 acres within Zone 1 and approximately 220 acres within Zone 2. The capacity analysis calculated the equivalent single family dwellings (ESDs) of wastewater demand (calculated at an average density of 6 ESDs/acre) at 3,300 ESDs. Based the initial phase of development within Phase 1 of the SPSP, wastewater flows would be 2.51 million gallons per day (mgd) of Peak Wet Weather Flow (PWWF).

The proposed project initial facilities would serve these areas by constructing two medium sized pump stations north of Riego Road. One pump station will be in Zone 1 and the second pump station will be in Zone 2. Figure 2-1 in Chapter 2 – Project Description illustrates the location of the SPSP in relation to the SASD UNWI its connection with the interceptor to the Regional San's SRWTP. Flow calculations were made under the guidelines outlined in the SASD 2013 Standards and Specifications Section 201.2, and it was determined that a 12-inch force main pipe would be sufficient to convey the wastewater from the pump station in Zone 1 to the pump station in Zone 2, and that a 14-inch force main pipe would be used to convey wastewater from there to the point of connection with the UNWI. The calculation of ADWF is based on 310 gallons per day (gpd)/ESD multiplied by the number of ESDs (3,300 ESDs x 310 gallons per day per ESD = 1.02 mgd ADWF). The calculation of PWWF is based on 310 gpd/ESD multiplied by a peaking factor and then adding 1,400 gpd/acre of infiltration and inflow (2.51 mgd PWWF). The pump stations were sized based on the PWWF of 2.51 mgd. This flow rate is within SASD's service range of 1 to 7 mgd.

Impacts Adequately Analyzed in the SPSP EIR or not Applicable to the Project

As determined in the Environmental Checklist prepared for the proposed project, impacts related to other utilities and service systems were determined to have no impact or be less than significant and are not evaluated in this section of the Focused Tiered EIR (see the Environmental Checklist in Appendix B).

Proposed Project Impacts and Mitigation Measures

Table 3.5-1 provides a summary of the impacts identified for the proposed project. The level of significance after any mitigation measures is also presented. Each of these impacts is discussed in more detail below.

TABLE 3.5-1.
PROPOSED PROJECT IMPACT SUMMARY – WASTEWATER CONVEYANCE AND TREATMENT

Impact	Initial Facilities		Future Facilities	
	Before Mitigation	After Mitigation	Before Mitigation	After Mitigation
3.5-1: The proposed project could exceed existing wastewater conveyance capacity.	LS	NA	LS	NA
3.5-2: The proposed project could result in a determination by the wastewater treatment provider that serves or may serve the project that it has inadequate capacity to serve the project's projected demand in addition to the provider's existing commitments.	LS	NA	LS	NA

LS = Less than Significant Impact
NA = Not Applicable

Impact 3.5-1: The proposed project could exceed existing wastewater conveyance capacity.

Initial Facilities

The Wastewater Service Agreement requires that SPSP sewer facilities be designed and constructed pursuant to standards and specifications by SASD and Regional San. The proposed project would construct conveyance facilities with the required capacity to provide sewer service for an initial 3,300 ESD's. Regional San analyzed the capacity of the UNWI and LNWI system and determined that there is sufficient capacity for connection and conveyance of PWWF generated from full buildout within the SPSP because the Regional San would change its operational strategy to diver flow from the UNWI 4/5 junction and reduce pumping from their New Natomas Pump Station (MacKay & Somps, 2015), and, therefore, there would be a ***less-than-significant impact*** on the Regional San conveyance capacity.

Future Facilities

Construction of the future wastewater conveyance facilities would be designed to the current standards and specifications at the time of final design. The conveyance of additional wastewater flows into the UNWI would require additional modeling by Sutter County and potential improvements to the SPSP system pump stations to accommodate additional flows from future development within the SPSP area. In addition, the future facilities would require approval by SASD and Region San prior to final design and construction. Regional San analyzed the capacity of the UNWI and LNWI system and determined that there is sufficient capacity for connection and conveyance of PWWF generated from full buildout within the SPSP because the Regional San would change its operational strategy to divert flow from the UNWI 4/5 junction and reduce pumping from their New Natomas Pump Station (MacKay & Somps, 2015), and, therefore, there would be a ***less-than-significant impact*** on Regional San's conveyance capacity.

Mitigation Measures

None required.

Impact 3.5-2: The proposed project could result in a determination by the wastewater treatment provider that serves or may serve the project that it has inadequate capacity to serve the project's projected demand in addition to the provider's existing commitments.

Initial and Future Facilities

As described previously, the maximum discharge limit of the current NPDES permit for the SRWTP prohibits a discharge in excess of 181 mgd of treated effluent into the Sacramento River. While there was a significant increase in new development over the last fifteen years, the average dry weather flows to the SRWTP have consistently decreased from 155 mgd in 2000 to 106 mgd in 2014. The rate of decrease in ADWF from existing customers is expected to slow over time as a larger percentage of existing customers are retrofitted with low flow devices. Over time, new

flows generated within the region from new development will counteract the declining trend in ADWF. Future new connections will be built under more stringent building codes that will mandate the use of low flow fixtures and existing connections will be retrofitted over time with water saving devices, continuing the downward trend in per capita wastewater generation rates. Regional San expects that the per capita wastewater generation rates in its service area will continue to experience a downward trend. Regional San anticipates a relatively moderate growth rate in new connections (new ESDs) during the period between 2014 and 2024 – a maximum of 0.5% each year (MacKay & Somps, 2015).

As reported in the MacKay & Somps capacity analysis the SRWTP has the capacity to meet the projected flows through the year 2060, including service for wastewater generation from future development within the SPSP area and Contracting Agencies (MacKay & Somps, 2015). The proposed project would construct initial facilities that would convey up to 2.51 mgd PWWF from development within the Initial Development Area. Future development within the SPSP would generate up to an additional 20.59 mgd PWWF at full buildout conveyed with the construction of the future facilities.

Additionally, Regional San conducted modeling analyses that determined that the SRWTP has the necessary capacity to serve the current development plans within the SPSP, in addition to the other current and reasonably projected flows anticipated from the Regional San's Contributing Members and Contracting Agencies. Based on those results, the capacity analysis prepared by MacKay & Somps confirmed that the current Regional San SRWTP has the capacity to extend service to the SPSP area without affecting the ability of Regional San to serve its Contributing Members and Contracting Agencies for at least approximately 44 more years. Further, flows from the SPSP area would be required to meet wastewater flow and quality requirements of Regional San in order for it to meet its waste discharge requirements in its NPDES permit for current and future discharge requirements of the CVRWQCB. Because the capacity of the SRWTP and its associated processes is sufficient to meet the demands of the SPSP and Regional San's Contributing Members and Contracting Agencies, this impact would be ***less than significant***.

Mitigation Measures

None required.

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3.6 Noise

3.6.1 Introduction

This section describes the existing noise environment in the vicinity of the proposed project, and evaluates the potential for impacts associated with noise and vibration during construction and operation. All relevant information, including applicable environmental and regulatory setting, standards of significance, and mitigation measures identified in Section 3.4 of the 2009 SPSP EIR are incorporated by reference, and summarized below as appropriate.

No comments were received in response to the NOP related to noise (see Appendix C).

3.6.2 Environmental Setting

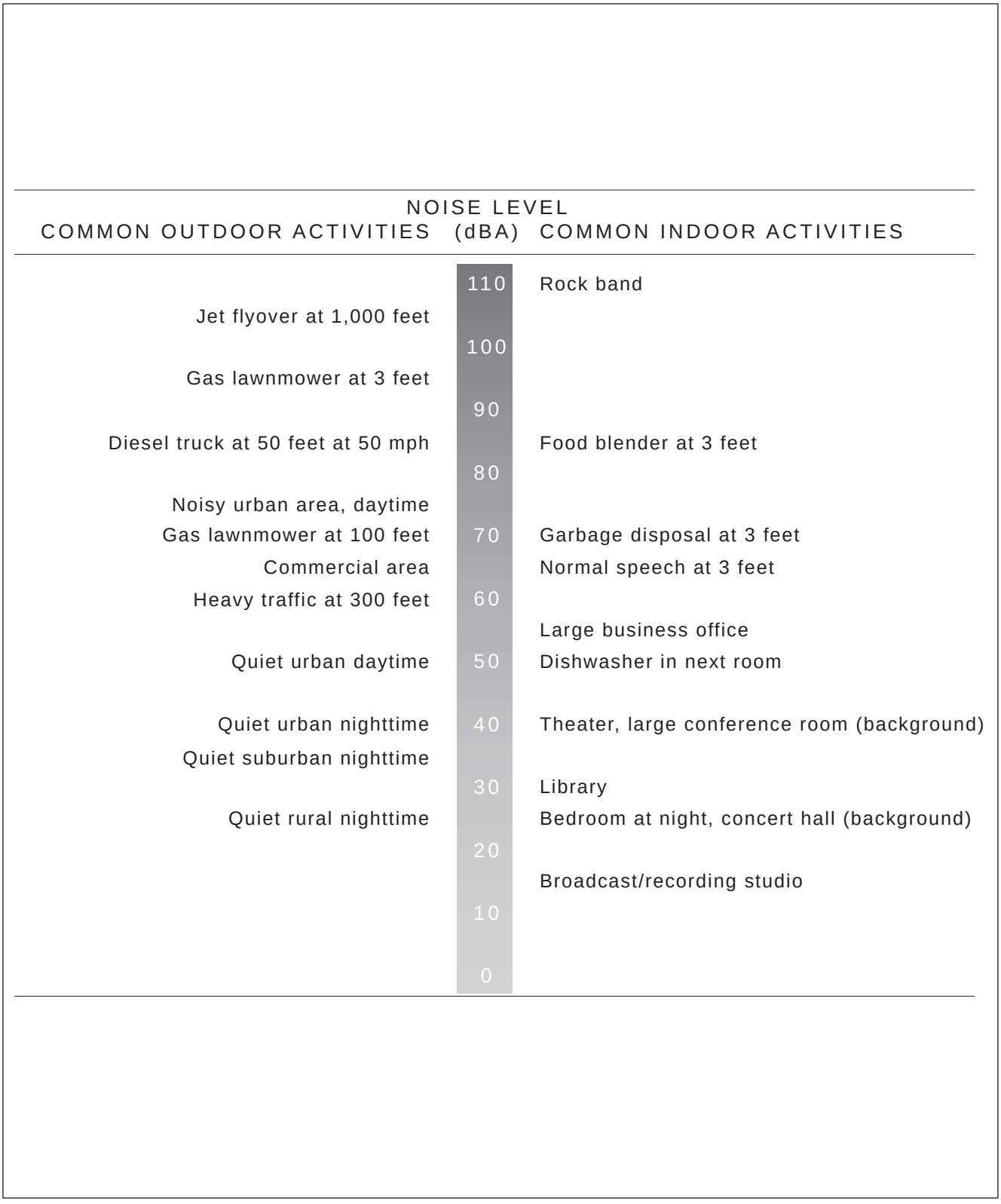
Introduction to Noise Principles and Descriptors

Noise is defined as unwanted sound. Sound, traveling in the form of waves from a source, exerts a sound pressure level (referred to as sound level) that is measured in decibels (dB), with zero dB corresponding roughly to the threshold of human hearing and 120 dB to 140 dB corresponding to the threshold of pain. Pressure waves traveling through air exert a force registered by the human ear as sound.

Noise Exposure and Community Noise

An individual's noise exposure is a measure of noise over a period of time. Noise level is a measure of noise at a given instant in time. The noise levels presented in **Figure 3.6-1** are representative of measured noise at a given instant; however, they rarely persist consistently over a long period of time. Rather, community noise varies continuously over a period of time with respect to the contributing sound sources of the community noise environment. Community noise is primarily the product of many distant noise sources, which constitute a relatively stable background noise exposure, with the individual contributors unidentifiable. The background noise level changes throughout a typical day, but does so gradually, corresponding with the addition and subtraction of distant noise sources such as traffic and atmospheric conditions. What makes community noise constantly variable throughout a day, besides the slowly changing background noise, is the addition of short duration single event noise sources such as aircraft fly-overs, moving vehicles, sirens, etc., which are readily identifiable to the individual.

These successive additions of sound to the community noise environment vary the community noise level from instant to instant, requiring the measurement of noise exposure over a period of time to legitimately characterize a community noise environment and evaluate cumulative noise impacts. This time-varying characteristic of environmental noise is described using statistical noise descriptors. The most frequently used noise metrics and their descriptions include the following:



SOURCE: Caltrans, 2013

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Figure 3.6-1
Typical Noise Levels

L_{eq}: The equivalent sound level is used to describe noise over a specified period of time, typically one hour, in terms of a single numerical value. Leq is the constant sound level that contains the same acoustic energy as the varying sound level, during the same time period (i.e., the average noise exposure level for the given time period).

L_{max}: The instantaneous maximum noise level for a specified period of time.

L_{10}: The noise level that equals or exceeds 10 percent of the specified time period. L_{10} is often considered the maximum noise level averaged over the specified time period.

L_{90}: The noise level that equals or exceeds 90 percent of the specified time period. The L_{90} is often considered the background noise level averaged over the specified time period.

DNL or L_{dn}: 24-hour day and night A-weighted noise exposure level that accounts for the greater sensitivity of most people to nighttime noise by weighting noise levels at night ("penalizing" nighttime noises.) Noise between 10:00 p.m. and 7:00 a.m. is weighted (penalized) by adding 10 dBA to take into account the greater annoyance of nighttime noise.

CNEL: Similar to the DNL, the Community Noise Equivalent Level (CNEL) adds a 5 dBA "penalty" for the evening hours between 7:00 p.m. and 10:00 p.m. in addition to a 10 dBA penalty between the hours of 10:00 p.m. and 7:00 a.m.

Effects of Noise on People

The effects of noise on people can be divided into three categories:

- Subjective effects of annoyance, nuisance, dissatisfaction;
- Interference with activities such as speech, sleep, learning; and
- Physiological effects such as hearing loss or sudden startling.

Environmental noise typically produces effects in the first two categories. Workers in industrial environments can experience noise effects of the third category. There is no completely satisfactory way to measure the subjective effects of noise, or the corresponding reactions of annoyance and dissatisfaction. A wide variation in individual thresholds of annoyance exists, and different tolerances to noise tend to develop based on an individual's past experiences with noise.

Therefore, an important way of predicting a human reaction to a new noise environment is the way it compares to the existing environment to which one has adapted or "ambient noise" level. In general, the more a new noise exceeds the previously existing ambient noise level, the less acceptable the new noise will be judged by those hearing it. With regard to increases in A-weighted noise level (dBA), the following relationships occur (Caltrans, 2013):

- Under controlled conditions in an acoustics laboratory, the trained healthy human ear is able to discern changes in sound levels of 1 dBA;
- Outside of such controlled conditions, the trained ear can detect changes of 2 dBA in normal environmental noise;
- It is widely accepted that the average healthy ear, however, can barely perceive noise level changes of 3 dBA;
- A change in level of 5 dBA is a readily perceptible increase in noise level; and
- A 10 dBA increase is recognized as twice as loud as the original source.

These relationships occur in part because of the logarithmic nature of sound and the decibel system. On a logarithmic scale, the sum of two noise sources of equal loudness is 3 dBA greater than the noise generated by only one of the noise sources (e.g., a noise source of 60 dBA plus another noise source of 60 dBA generate a composite noise level of 63 dBA). To apply this formula to a specific noise source, in areas where existing levels are dominated by traffic, a doubling in the volume of the traffic will increase ambient noise levels by 3 dBA. Similarly, a doubling in the use of heavy equipment, such as use of two landfill dozer/compactors where formerly one was used, would also increase ambient noise levels by 3 dBA. A 3 dBA increase is the smallest change in noise level detectable to the average person.

Noise Attenuation

Stationary "point" sources of noise, including stationary mobile sources such as idling vehicles, attenuate (lessen) at a rate of 6 dBA to 7.5 dBA per doubling of distance from the source, depending upon environmental conditions (i.e., atmospheric conditions and noise barriers, either vegetative or manufactured, etc.). Widely distributed noises, such as a large industrial facility spread over many acres or a street with moving vehicles (a "line" source), would typically attenuate at a lower rate, approximately 3 to 4.5 dBA per doubling distance from the source (also dependent upon environmental conditions) (Caltrans, 2013). Noise from large construction sites would have characteristics of both "point" and "line" sources, so attenuation would generally range between 4.5 and 7.5 dBA per doubling of distance.

Ground-borne Vibration

As described in the Federal Transit Administration *Transit Noise and Vibration Impact Assessment* (FTA, 2006), ground-borne vibration can be a serious concern for nearby neighbors of a transit system route or maintenance facility, causing buildings to shake and rumbling sounds to be heard. In contrast to airborne noise, ground-borne vibration is not a common environmental problem. It is unusual for vibration from sources such as buses and trucks to be perceptible, even in locations close to major roads. Some common sources of ground-borne vibration are trains, buses on rough roads, and construction activities such as blasting, pile-driving and operating heavy earth-moving equipment.

The effects of ground-borne vibration include movement of the building floors, rattling of windows, shaking of items on shelves or hanging on walls, and rumbling sounds. In extreme cases, the vibration can cause damage to buildings. Building damage is not a factor for most projects, with the occasional exception of blasting and pile-driving during construction. Annoyance from vibration often occurs when the vibration exceeds the threshold of perception by only a small margin. A vibration level that causes annoyance will be well below the damage threshold for normal buildings. The FTA measure of the threshold of architectural damage for conventional sensitive structures is 0.2 in/sec peak particle velocity (PPV) (FTA, 2006).

Existing Noise Environment and Sensitive Receptors

Existing land uses surrounding the proposed pump stations are primarily agricultural in nature. However, there are two residential homes located approximately 1,000 feet east of the proposed pump station in zone 2. Along the proposed force main alignment there are single- and multi-family receptors within the communities of Rio Linda and Elverta. These sensitive receptors could be as close as 50 feet from where construction activities would occur along the force main alignment.

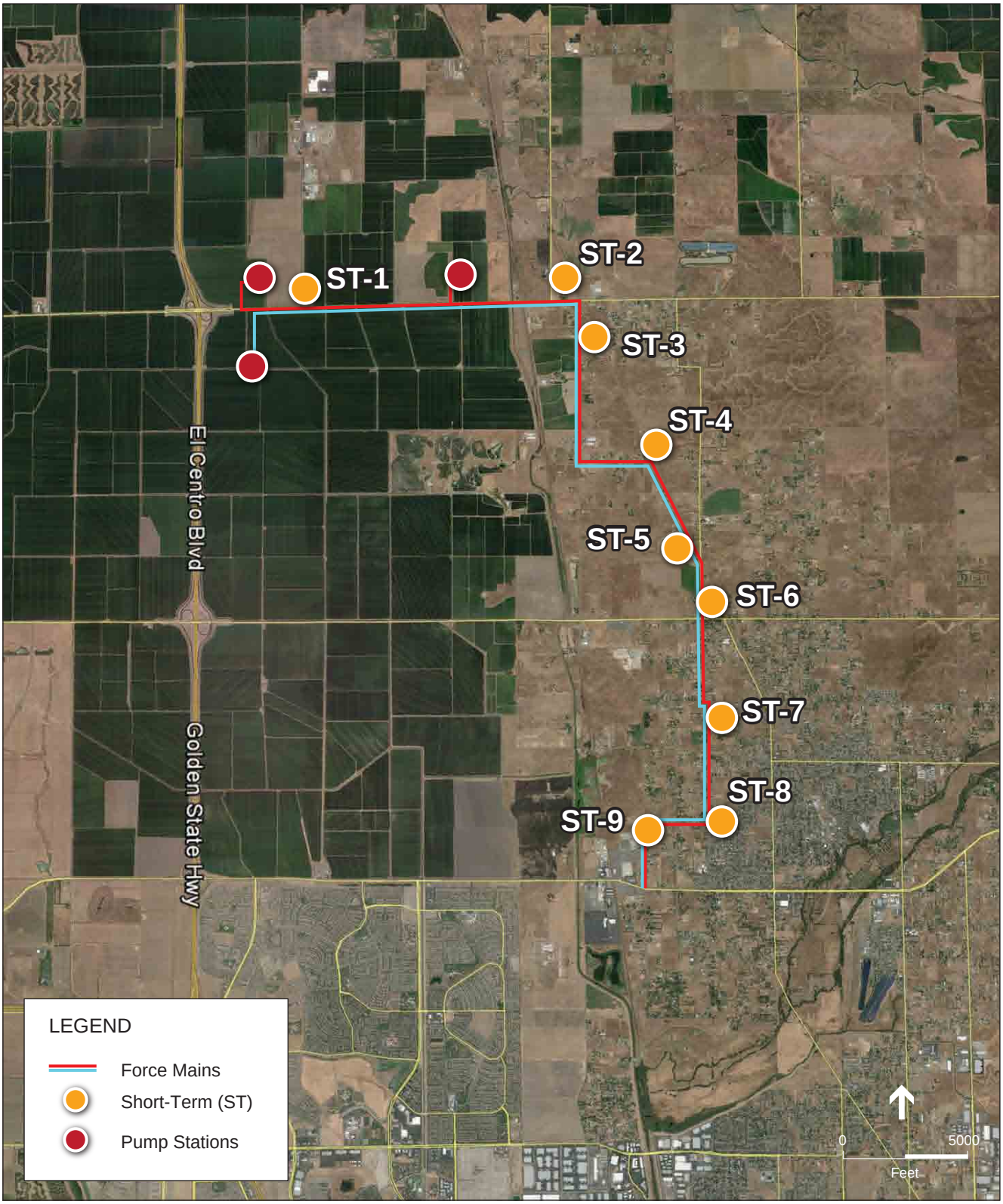
The ambient noise environment surrounding the proposed pump stations and along the force main alignment is primarily the result of vehicular traffic along Riego Road, Pleasant Grove Road, Rio Linda Blvd., Ewyn Avenue, W. 2nd Street, W. M Street and W. 6th Street. Other noise sources in the area include occasional aircraft overflights from Riego Flight Strip (located approximately 2.5 miles from the project's western boundary) and Sacramento International Airport (located approximately four miles from the project's south-west boundary).

To quantify the existing ambient noise levels in the project vicinity, a noise survey was conducted within and near the proposed pump stations and along the force main route. The noise measurement survey was conducted on March 22, 2016, and consisted of nine 15-minute short-term measurements. These locations are illustrated in **Figure 3.6-2**. The area surrounding the pump stations and force main route is dominated by localized traffic noise, which was measured to be as high as 64.6 dBA L_{eq}. The results of the 15-minute short-term noise survey are presented in **Table 3.6-1** and include the L_{eq} values and descriptions of localized noise sources at all nine monitoring locations. All noise measurements were conducted using a Larson Davis 831 sound level meter (SLM) that was calibrated before and after the noise measurement survey.

TABLE 3.6-1.
15-MINUTE SHORT-TERM AMBIENT NOISE MONITORING RESULTS

Measurement	Start time	L_{eq} (dBA)	L_{max} (dBA)	Primary Noise Source(s)
1	10:13 a.m.	64.6	88.4	Vehicular Traffic along W. Riego Rd.
2	9:46 a.m.	64.1	84.0	Vehicular Traffic along W. Riego Rd.
3	9:28 a.m.	59.4	84.1	Vehicular Traffic along Pleasant Grove Rd.
4	9:08 a.m.	57.5	74.7	Vehicular Traffic along Rio Linda Blvd.
5	8:47 a.m.	54.1	76.5	Vehicular Traffic along Rafael Dr.
6	8:29 a.m.	63.1	81.6	Vehicular Traffic along Elwyn Ave.
7	8:07 a.m.	56.7	80.5	Vehicular Traffic along W. 2nd Street
8	7:43 a.m.	55.3	73.0	Vehicular Traffic along W. 2nd Street
9	7:20 a.m.	61.9	80.9	Vehicular Traffic along W. 6th Street

SOURCE: ESA, 2016



SOURCE: Caltrans, 2013

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Figure 3.6-2

Noise Measurement Locations

3.6.3 Regulatory Setting

Federal

Federal regulations establish noise limits for medium and heavy trucks (more than 4.5 tons, gross vehicle weight rating) under 40 Code of Federal Regulations (CFR), Part 205, Subpart B. The federal truck pass-by noise standard is 80 dB at 15 meters from the vehicle pathway centerline. These controls are implemented through regulatory controls on truck manufacturers.

State

California Code of Regulations has guidelines for evaluating the compatibility of various land uses as a function of community noise exposure. The State of California also establishes noise limits for vehicles licensed to operate on public roads. For heavy trucks, the State pass-by standard is consistent with the federal limit of 80 dB. The State pass-by standard for light trucks and passenger cars (less than 4.5 tons, gross vehicle rating) is also 80 dB at 15 meters from the centerline. These standards are implemented through controls on vehicle manufacturers and by legal sanction of vehicle operators by state and local law enforcement officials.

The State has also established noise insulation standards for new multi-family residential units, hotels, and motels that would be subject to relatively high levels of transportation-related noise. These requirements are collectively known as the California Noise Insulation Standards (Title 24, California Code of Regulations). The noise insulation standards set forth an interior standard of DNL 45 dB in any habitable room. They require an acoustical analysis demonstrating how dwelling units have been designed to meet this interior standard where such units are proposed in areas subject to noise levels greater than DNL 60 dB. Title 24 standards are typically enforced by local jurisdictions through the building permit application process.

Local

In California, local regulation of noise involves implementation of General Plan policies and Noise Ordinance standards. Local General Plans identify general principles intended to guide and influence development plans, and Noise Ordinances set forth the specific standards and procedures for addressing particular noise sources and activities.

General Plans recognize that different types of land uses have different sensitivities toward their noise environment; residential areas are considered to be the most sensitive type of land use to noise and industrial/commercial areas are considered to be the least sensitive.

Sutter County 2030 General Plan

The following goals and policies from the Sutter County General Plan (Sutter County, 2011) related to noise are applicable to the proposed Project:

GOAL N 1: Protect the health and safety of County residents from the harmful effects of exposure to excessive noise and vibration.

- **Policy N 1.2: Exterior Incremental Environmental Noise Standards.** Require new development to mitigate noise impacts on noise sensitive uses where the projected increases in exterior noise levels exceed those shown in Table 3.6-2.

TABLE 3.6-2.
COUNTY OF SUTTER GENERAL PLAN
EXTERIOR INCREMENTAL ENVIRONMENTAL NOISE IMPACT STANDARDS
FOR NOISE SENSITIVE USES (dBA)

Residences and Buildings Where People Normally Sleep[a]		Institutional Land Uses with Primarily Daytime and Evening Uses[b]	
Existing L_{dn}	Allowable Noise Increment	Existing Peak Hour L_{eq}	Allowable Noise Increment
45	8	45	12
50	5	50	9
55	3	55	6
60	2	60	5
65	1	65	3
70	1	70	3
75	0	75	1
80	0	80	0

NOTES:

Noise Levels are measured at the property line of the noise-sensitive use.

a. This category includes homes, hospitals, and hotels where a nighttime sensitivity to noise is assumed to be of utmost importance.

b. This category includes schools, libraries, theaters, and churches where it is important to avoid interference with such activities as speech, meditation, and concentration on reading material.

SOURCE: Federal Transit Administration, Transit Noise Impact and Vibration Assessment, May 2006.

- **Policy N 1.3: Interior Noise Standards.** Require new development to mitigate noise impacts to ensure acceptable interior noise levels appropriate to the land use type as shown in Table 3.6-3 (Maximum Allowable Environmental Noise Standards).

- **Policy N 1.4: New Stationary Noise Sources.** Require new development to mitigate noise impacts to ensure acceptable interior noise levels appropriate to the land use type as shown in Table 3.6-4.

- **Policy N 1.6: Construction Noise.** Require discretionary projects to limit noise-generating construction activities within 1,000 feet of noise-sensitive uses (i.e., residential uses, daycares, schools, convalescent homes, and medical care facilities) to daytime hours between 7:00 a.m. and 6:00 p.m. on weekdays, 8:00 a.m. and 5:00 p.m. on Saturdays, and prohibit construction on Sundays and holidays unless permission for the latter has been applied for and granted by the County.

- **Policy N 1.7: Vibration Standards.** Require construction projects and new development anticipated to generate a significant amount of vibration to ensure acceptable interior vibration levels at nearby noise-sensitive uses based on Federal Transit Administration criteria as shown in Table 3.6-5.

TABLE 3.6-3.
COUNTY OF SUTTER GENERAL PLAN
MAXIMUM ALLOWABLE ENVIRONMENTAL NOISE STANDARDS

Land Use	Exterior Noise Level Standard for Outdoor Activity Areas[a]	Interior Noise Level Standard	
	L_{dn}/CNEL, dBA	L_{dn}/CNEL, dBA	L_{eq}, dBA[b]
Residential (Low Density Residential, Duplex, Mobile Homes)	60[c]	45	N/A
Residential (Multi Family)	65[d]	45	N/A
Transient Lodging (Models/Hotels)	65[d]	45	N/A
Schools, Libraries, Churches, Hospitals, Nursing Homes, Museums	70	45	N/A
Theaters, Auditoriums	70	N/A	35
Playgrounds, Neighborhood Parks	70	N/A	N/A
Golf Courses, Riding Stables, Water Recreation, Cemeteries	75	N/A	N/A
Office Buildings, Business Commercial and Professional	70	N/A	45
Industrial, Manufacturing, Utilities, and Agriculture	75	N/A	45

NOTES:

Where a proposed use is not specifically listed on this table, the use shall comply with the noise exposure standards for the nearest similar use as determined by the Community Services Department.

a. Outdoor activity areas for residential developments are considered to be the back yard patios or decks of single-family residential units, and the patios or common areas where people generally congregate for multi-family development. Outdoor activity areas for nonresidential developments are considered to be those common areas where people generally congregate, including outdoor seating areas.
Where the location of outdoor activity areas is unknown, the exterior noise standard shall be applied to the property line of the receiving land use.
b. As determined for a typical worst-case hour during periods of use.
c. Where it is not possible to reduce noise in outdoor activity areas to 60 dB, Ldn/CNEL or less using a practical application of the best-available noise reduction measures, an exterior level of up to 65 dB, Ldn/CNEL may be allowed provided that available exterior noise level reduction measures have been implemented and interior noise levels are in compliance with this table.
d. Where it is not possible to reduce noise in outdoor activity areas to 65 dB, Ldn/CNEL or less using a practical application of the best-available noise reduction measures, an exterior level of up to 70 dB, Ldn/CNEL may be allowed provided that available exterior noise level reduction measures have been implemented and interior noise levels are in compliance with this table.

TABLE 3.6-4.
COUNTY OF SUTTER GENERAL PLAN
NOISE LEVEL STANDARDS FROM STATIONARY SOURCES

Noise Level Descriptor	Daytime (7:00 a.m. to 10:00 p.m.)	Nighttime (10:00 p.m. to 7:00 a.m.)
Hourly L_{eq}, dBA	55	45
Maximum level, dBA	70	65

NOTE:

Noise Levels are measured at the property line of the noise-sensitive use.

TABLE 3.6-5.
COUNTY OF SUTTER GENERAL PLAN
GROUNDBORNE VIBRATION IMPACT CRITERIA FOR GENERAL ASSESSMENT

Land Use Category	Impact Levels (VdB)		
	Frequent Events[a]	Occasional Events[b]	Infrequent Events[c]
Category 1: Buildings where vibration would interfere with interior operations	65[d]	65[d]	65[d]
Category 2: Residences and buildings where people normally sleep	72	75	80
Category 3: Institutional land uses with primarily daytime uses	75	78	83

NOTES:

Vibration levels are measured in or near the vibration-sensitive use.
a. "Frequent Events" is defined as more than 70 vibration events of the same source per day.
b. "Occasional Events" is defined as between 30 and 70 vibration events of the same source per day.
c. "Infrequent Events" is defined as fewer than 30 vibration events of the same source per day.
d. This criterion limit is based on levels that are acceptable for most moderately sensitive equipment such as optical microscopes. Vibration-sensitive manufacturing or research will require detailed evaluation to define the acceptable vibration levels.

SOURCE: Federal Transit Administration, Transit Noise Impact and Vibration Assessment, May 2006.

Sacramento County 2030 General Plan

The following goals and policies from the Sacramento County General Plan (Sacramento County, 2011) related to noise are applicable to the proposed project:

GOAL 1: To protect the existing and future citizens of Sacramento County from the harmful effects of exposure to excessive noise. More specifically, to protect existing noise-sensitive land uses from new uses that would generate noise levels which are incompatible with those uses, and to discourage new noise-sensitive land uses from being developed near sources of high noise levels.

GOAL 2: To protect the economic base of Sacramento County by preventing the encroachment of noise-sensitive land uses into areas affected by existing noise-producing uses. More specifically, to recognize that noise is an inherent by-product of many land uses and to prevent new noise-sensitive land uses from being developed in areas affected by existing noise-producing uses.

GOAL 3: To provide the County with flexibility in the development of infill properties which may be located in elevated noise environments.

GOAL 4: To provide sufficient noise exposure information so that existing and potential future noise impacts may be effectively addressed in the land use planning and project review processes.

- **Policy NO-6:** Where a project would consist of or include non-transportation noise sources, the noise generation of those sources shall be mitigated so as not exceed the interior and exterior noise level standards of Table 3.6-6 at existing noise-sensitive areas in the project vicinity.

TABLE 3.6-6.
COUNTY OF SACRAMENTO GENERAL PLAN
NON-TRANSPORTATION NOISE STANDARDS
MEDIAN (L_{50})/MAXIMUM (L_{max})

Receiving Land Use	Outdoor Area[2]		Interior[3]	Notes
	Daytime	Nighttime	Day & Night	
All Residential	55/75	50/70	35/55	4
Transient Lodging	55/75	---	35/55	5, 6
Hospitals & Nursing Homes	55/75	---	35/55	6
Theaters & Auditoriums	---	---	30/50	6
Churches, Meeting Halls, Schools, Libraries, etc.	55/75	---	35/60	6
Office Buildings	60/75	---	45/65	6
Commercial Buildings	---	---	45/65	6
Playgrounds, Parks, etc.	60/75	---	---	6
Industry	60/80	---	50/70	6

NOTES:

1. The Table 3.6-6 standards shall be reduced by 5 dB for sounds consisting primarily of speech or music, and for recurring impulsive sounds. If the existing ambient noise level exceeds the standards of Table 3.6-6, then the noise level standards shall be increased at 5 dB increments to encompass the ambient.
2. Sensitive areas are defined acoustic terminology section.
3. Interior noise level standards are applied within noise-sensitive areas of the various land uses, with windows and doors in the closed positions.
4. Outdoor activity areas of transient lodging facilities are not commonly used during nighttime hours.
5. Hospitals are often noise-generating uses. The exterior noise level standards for hospitals are applicable only at clearly identified areas designated for outdoor relaxation by either hospital staff or patients.
6. The outdoor activity areas of these uses (if any), are not typically utilized during nighttime hours.
7. Where median (L_{50}) noise level data is not available for a particular noise source, average (Leq) values may be substituted for the standards of this table provided the noise source in question operates for at least 30 minutes of an hour. If the source in question operates less than 30 minutes per hour, then the maximum noise level standards shown would apply.

- **Policy NO-7:** The "last use there" shall be responsible for noise mitigation. However, if a noise-generating use is proposed adjacent to lands zoned for uses which may have sensitivity to noise, then the noise generating use shall be responsible for mitigating its noise generation to a state of compliance with the Table 3.6-6 standards at the property line of the generating use in anticipation of the future neighboring development.

- **Policy NO-8:** Noise associated with construction activities shall adhere to the County Code requirements. Specifically, Section 6.68.090(e) addresses construction noise within the County.

- **Policy NO-12:** All noise analyses prepared to determine compliance with the noise level standards contained within this Noise Element shall be:

    1. Be the responsibility of the applicant.

    2. Be prepared by qualified persons experienced in the fields of environmental noise assessment and architectural acoustics.

    3. Include representative noise level measurements with sufficient sampling periods and locations to adequately describe local conditions.

4. Estimate projected future (20 year) noise levels in terms of the standards presented in Table 3.6-6 and compare those levels to the adopted policies of the Noise Element.

5. Recommend appropriate mitigation to achieve compliance with the adopted policies and standards of the Noise Element.

6. Estimate interior and exterior noise exposure after the prescribed mitigation measures have been implemented.

- **Policy NO-16:** The following sources of noise shall be exempt from the provisions of this Noise Element:

  a. Emergency warning devices and equipment operated in conjunction with emergency situations, such as sirens and generators which are activated during power outages. The routine testing of such warning devices and equipment shall also be exempt provided such testing occurs during daytime hours.

  b. Activities associated with events for which a permit has been obtained from the County.

Placer County General Plan

The following goals and policies from the Placer County General Plan (Placer County, 2013) related to noise are applicable to the proposed Project:

GOAL 9.A: To protect County residents from the harmful and annoying effects of exposure to excessive noise.

- **Policy 9.A.2:** Noise created by new proposed non-transportation noise sources shall be mitigated so as not to exceed the noise level standards of Table 3.6-7 as measured immediately within the property line of lands designated for noise-sensitive uses: provided, however, the noise created by occasional events occurring within a stadium on land zoned for university purposes may temporarily exceed these standards as provided in an approved Specific Plan.

- **Policy 9.A.11:** The County shall require one or more of the following mitigation measures where existing noise levels significantly impact existing noise-sensitive land uses, or where the cumulative increase in noise levels resulting from new development significantly impacts noise-sensitive land uses:

  a. Rerouting traffic onto streets that have available traffic capacity and that do not adjoin noise-sensitive land uses;

  b. Lowering speed limits, if feasible and practical;

  c. Programs to pay for noise mitigation such as low cost loans to owners of noise-impacted property or establishment of developer fees;

  d. Acoustical treatment of buildings; or,

  e. Construction of noise barriers.

TABLE 3.6-7.
COUNTY OF PLACER GENERAL PLAN
ALLOWABLE L_{DN} NOISE LEVELS WITHIN SPECIFIED ZONE DISTRICTS
APPLICABLE TO NEW PROJECTS AFFECT BY OR INCLUDING
NON-TRANSPORTATION SOURCES

Zone District of Receptor	Property Line of Receiving Use (dBA)	Interior Spaces (dBA)
Residential Adjacent to Industrial[3]	60	45
Other Residential[4]	50	45
Office/Professional	70	45
Transient Lodging	65	45
Neighborhood Commercial	70	45
General Commercial	70	45
Heavy Commercial	75	45
Limited Industrial	75	45
Highway Service	75	45
Shopping Center	70	45
Industrial	---	45
Industrial Park	75	45
Industrial Reserve	---	---
Airport	---	45
Unclassified	---	---
Farm	(see footnote 6)	---
Agriculture Exclusive	(see footnote 6)	---
Forestry	---	---
Timberland Preserve	---	---
Recreation & Forestry	70	---
Open Space	---	---
Mineral Reserve	---	---

NOTES:

Except where noted otherwise, noise exposures will be those which occur at the property line of the receiving use.

Where existing transportation noise levels exceed the standards of this table, the allowable Ldn shall be raised to the same level as that of the ambient level.

If the noise source generated by, or affecting, the uses shown above consists primarily of speech or music, of if the noise source is impulsive in nature, the noise standards shown above shall be decreased by 5 dB.

Where a use permit has established noise level standards for an existing use, those standards shall supersede the levels specified in Table 3.7-7. Similarly, where an existing use which is not subject to a use permit causes noise in excess of the allowable levels in Table 3.7-7, said excess noise shall be considered the allowable level. If a new development is proposed which will be affected by noise from such an existing use, it will ordinarily be assumed that the noise levels already existing or those levels allowed by the existing use permit, whichever are greater, are those levels actually produced by the existing use.

Existing industry located in industrial zones will be given the benefit of the doubt in being allowed to emit increased noise consistent with the state of the art[5] at the time of expansion. In no case will expansion of an existing industrial operation because to decrease allowable noise emission limits. Increased emissions above those normally allowable should be limited to a one-time 5 dB increase at the discretion of the decision making body.

The noise level standards applicable to land uses containing incidental residential uses, such as caretaker dwellings at industrial facilities and homes on agriculturally zoned land, shall be the standards applicable to the zone district, not those applicable to residential uses.

Where no noise level standards have been provided for a specific zone district, it is assumed that the interior and/or exterior spaces of these uses are effectively insensitive to noise.

1. Overriding policy on interpretation of allowable noise levels: Industrial-zoned properties are confined to unique areas of the County, and are irreplaceable. Industries which provide primary wage-earner jobs in the County, if forced to relocate, will likely be

TABLE 3.6-7.
COUNTY OF PLACER GENERAL PLAN
ALLOWABLE L_{DN} NOISE LEVELS WITHIN SPECIFIED ZONE DISTRICTS
APPLICABLE TO NEW PROJECTS AFFECT BY OR INCLUDING
NON-TRANSPORTATION SOURCES

forced to leave the County. For this reason, industries operating upon industrial zoned properties must be afforded reasonable opportunity to exercise the rights/privileges conferred upon them be their zoning. Whenever the allowable noise levels herein fall subject to interpretation relative to industrial activities, the benefit of the doubt shall be afforded to the industrial use. Where an industrial use is subject to infrequent and unplanned upset or breakdown of operations resulting in increased noise emissions, where such upsets and breakdowns are reasonable considering the type of industry, and where the industrial use exercises due diligence in preventing as well as correcting such upsets and breakdowns, noise generated during such upsets and breakdowns shall not be included in calculations to determine conformance with allowable noise levels.

2. Interior spaces are defined as any locations where some degree of noise-sensitivity exists. Examples include all habitable rooms of residences, and areas where communication and speech intelligibility are essential, such as classrooms and offices.

3 Noise from industrial operations may be difficult to mitigate in a cost-effective manner. In recognition of this fact, the exterior noise standards for residential zone districts immediately adjacent to industrial, limited industrial, industrial park, and industrial reserve zone districts have been increased by 10 dB as compared to residential districts adjacent to other land uses. For purposes of the Noise Element, residential zone districts are defined to include the following zoning classifications: AR, R-1, R-2, R-3, FR, RP, TR-1, TR-2, TR-3, and TR-4.

4. Where a residential zone district is located within an -SP combining district, the exterior noise level standards are applied at the outer boundary of the -SP district. If an existing industrial operation within an - SP district is expanded or modified, the noise level standards at the outer boundary of the -SP district may be increased as described above in these standards. Where a new residential use is proposed in an -SP zone, an Administrative Review Permit is required, which may require mitigation measures at the residence for noise levels existing and/or allowed by use permit as described under "NOTES," above, in these standards.

5. State of the art should include the use of modern equipment with lower noise emissions, site design, and plant orientation to mitigate offsite noise impacts, and similar methodology.

6. Normally, agricultural uses are noise insensitive and will be treated in this way. However, conflicts with agricultural noise emissions can occur where single-family residences exist within agricultural zone districts. Therefore, where effects of agricultural noise on residences located in these agricultural zones is a concern an L_{dn} of 70 dBA will be considered acceptable outdoor exposure at a residence.

Sacramento County Noise Ordinance

The Sacramento County Ordinance Chapter 6.68 Noise Control sets limits for exterior noise levels on designated agricultural and residential property and interior noise levels pertaining to multiple dwelling units (**Table 3.6-8**). The ordinance states that exterior noise shall not exceed 55 dB during any cumulative 30-minute period in any hour during the day (7:00 a.m. to 10:00 p.m.) and 50 dB during any cumulative 30-minute period in any hour during the night (10:00 p.m. to 7:00 a.m.). The ordinance sets somewhat higher noise limits for time intervals of shorter duration; however, noise in agricultural and residential areas must never exceed 75 dB during the day and 70 dB at night. In addition, the following ordinance relates to construction noise.

Noise sources associated with construction, repair, remodeling, demolition, paving or grading of any real property, provided said activities do not take place between the hours of 8:00 p.m. and 6:00 a.m. on weekdays and Friday commencing at 8:00 p.m. through and including 7:00 a.m. on Saturday; Saturdays commencing at 8:00 p.m. through and including 7:00 a.m. on the next following Sunday and on each Sunday after the hour of 8:00 p.m. Provided, however, when an unforeseen or unavoidable condition occurs during a construction project and the nature of the project necessitates that work in process be continued until a specific phase is completed, the contractor or owner shall be allowed to continue work after 8:00 p.m. and to operate machinery and equipment necessary until completion of the specific work in progress can be brought to conclusion under conditions which will not jeopardize inspection acceptance or create undue financial hardships for the contractor or owner.

TABLE 3.6-8.
COUNTY OF SACRAMENTO COUNTY
NOISE ORDINANCE NOISE LEVEL STANDARDS (ON-SITE)

Cumulative Period	Noise Standard	
	Daytime (7 a.m. - 10 p.m.)	Nighttime (10 p.m. - 7 a.m.)
Exterior Noise Standards[1, 3]		
30 min/hr	55	50
15 min/hr	60	55
5 min/hr	65	60
1 min/hr	70	65
Never to exceed	75	70
Interior Noise Standards[2, 4]		
5 min/hr	---	45
1 min/hr	---	50
Any period of time	---	55

NOTES:

1. Noise created over the designated period at any location may not cause the noise levels on a designated agricultural or residential property to exceed these standards.
2. Noise created over the designated period in an apartment, condominium, townhouse, duplex, or multiple dwelling units may not cause the noise level in a neighboring unit to exceed these standards.
3. Exterior noise limits must be reduced by 5 dBA for impulsive or simple tone noises, or for noises consisting of speech or music.
4. If the ambient level exceeds the fifth noise level category for exterior noise standards, the maximum ambient noise level shall be the noise limit for the category.

SOURCE: Sacramento County Ordinance Chapter 6.68 Noise Control

Placer County Noise Ordinance

The Placer County Noise Ordinance (Article 9.36 of the Placer County Code) defines sound level performance standards for sensitive receptors (refer to Table 3.6-9). The ordinance states that it is unlawful for any person at any location to create any sound, or to allow the creation of any sound, on property owned, leased, occupied, or otherwise controlled by such a person that causes the exterior sound level, when measured at the property line of any affected sensitive receptor, to exceed the ambient sound level by 5 dBA or exceed the sound level standards as set forth in **Table 3.6-9**, whichever is greater.

TABLE 3.6-9.
COUNTY OF PLACER COUNTY
NOISE ORDINANCE NOISE LEVEL STANDARDS (ON-SITE)

Sound Level Descriptor (dBA)	Daytime (7:00 a.m. to 10:00 p.m.)	Nighttime (10:00 p.m. to 7:00 a.m.)
Hourly, L_{eq}	55	45
L_{max}	70	65

SOURCE: Placer County, Municipal Code 9.36 (Noise)

Each of the sound level standards specified in Table 3.6-8 shall be reduced by 5 dB for simple tone noise, consisting of speech and music. However, in no case shall the sound level standard be lower than the ambient sound level plus 5 dB.

According to section 9.36.030 (Exemptions), noise-generating activities are exempt from the above noise ordinance standards, including construction that is performed between 6:00 a.m. and 8:00 p.m., Monday through Friday, and between 8:00 a.m. and 8:00 p.m. Saturday and Sunday, provided that all construction equipment is fitted with factory-installed muffler devices and maintained in good working order.

3.6.4 Impacts and Mitigation Measures

Significance Criteria

For the purpose of this analysis, the relevant standards of significance from the 2009 SPSP EIR have been modified to determine whether implementing the proposed project would result in a significant impact. These standards of significance are also based on Appendix G of the State CEQA Guidelines. For purposes of this analysis, a project will have a significant effect on the noise environment if it would result in:

- Exposure of persons to or generation of noise levels in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies;
- Exposure of persons to or generation of excessive ground-borne vibration or ground-borne noise levels;
- A substantial permanent increase in ambient noise levels in the project vicinity above levels existing without the Project;
- A substantial temporary or periodic increase in ambient noise levels in the project vicinity above levels existing without the Project;
- For a project located within two miles of an airport or private airstrip, would the project expose people residing or working in the project area to excessive noise levels;

Construction Noise. The proposed project would result in a significant construction noise impact if activities occur outside of the permissible daytime hours in the County of Sutter, Placer or Sacramento, the construction noise would be considered significant if it exceeds the noise level standards depicted in Table 3.6-7, Table 3.6-9 and Table 3.6-8, respectively.

Vibration. The proposed project would result in a significant vibration impact if buildings would be exposed to the FTA building damage ground-borne vibration threshold level of 0.2 PPV or if sensitive individuals would be exposed to the FTA human annoyance response ground-borne vibration threshold level of 80 vibration decibels (VdB) (FTA, 2006).

Stationary Noise. For stationary noise sources (i.e., pump stations) operating in the County of Sutter, onsite noise levels from stationary non-transportation sources measured at the property line of the receiving use would be considered significant if the noise levels exceed the standards depicted in Table 3.6-4.

Methodology

The analysis in this section focuses on the anticipated increases in ambient noise levels at existing off-site noise-sensitive land uses with the construction of the two pump stations and the installation of the force main in Sutter County, Placer County, and Sacramento County.

An analysis of the temporary construction noise effects on nearby noise-sensitive land uses was assessed using methodology outlined in the Federal Highway Administration (FHWA) Road Construction Noise Model User's Guide (FHWA, 2006). This analysis is based on typical construction phases and equipment noise levels that are attenuated to nearest noise-sensitive land use. The modeled construction-related noise levels were modeled to gauge whether or not they would exceed their respective city's construction noise level thresholds, warranting implementation of construction noise control measures.

For the purposes of this assessment, the methodology described in the FTA's *Transit Noise and Vibration Impact Assessment* (FTA, 2006) was used to evaluate project-related vibration effects to nearby sensitive land uses. No impact pile driving is anticipated to occur during construction of the proposed project. Other than construction, there are no appreciable sources of vibration proposed after the construction of the two pump stations and installation of the force main. As a result, only construction-related vibration impacts were assessed.

To estimate the operational noise impacts, the primary noise sources were identified to come from the electric pumps and diesel powered emergency backup generators. The noise levels, for both pumps and generators, were calculated using the assumption that each would be running at 375.2 kilowatts (kW). During operations, both the electric pumps and diesel powered emergency backup generators would be fully enclosed. Propagation equations for stationary mechanical equipment were used to estimate the noise level at the nearest noise-sensitive receiver.

Impacts Adequately Analyzed in the SPSP EIR or not Applicable to the Project

As determined in the Environmental Checklist prepared for the proposed project, impacts relating to the exposure of people residing or working in the project area to excessive aircraft noise were determined to have no impact or be less than significant and were not evaluated in this section of the Focused Tiered EIR (see the Environmental Checklist in Appendix B).

Proposed Project Impacts and Mitigation Measures

Table 3.6-10 provides a summary of the impacts identified for the proposed project. The level of significance after any mitigation measures is also presented. Each of these impacts is discussed in more detail below.

TABLE 3.6-10.
PROPOSED PROJECT IMPACT SUMMARY – NOISE

Impact	Initial Facilities		Future Facilities	
	Before Mitigation	After Mitigation	Before Mitigation	After Mitigation
3.6-1: Project construction could expose persons to or generate noise levels in excess of standards established in the local general plans or noise ordinances, or applicable standards of other agencies.	LS	NA	LS	NA
3.6-2: Project operation could expose persons to or generate noise levels in excess of standards established in the local general plans or noise ordinances, or applicable standards of other agencies.	LS	NA	LS	NA
3.6-3: Project construction would expose persons to or generate excessive ground-borne vibration or ground-borne noise levels.	LS	NA	LS	NA
3.6-4: The proposed project would cause a substantial permanent increase in ambient noise levels in the project vicinity.	LS	NA	LS	NA

LS = Less than Significant Impact
NA = Not Applicable

Impact 3.6-1: Project construction could expose persons to or generate noise levels in excess of standards established in the local general plans or noise ordinances, or applicable standards of other agencies.

Initial Facilities

Proposed initial facilities include two medium capacity, on-site wastewater pump stations and one proposed force main connecting the pump stations with the UNWI. Pump stations would be installed below ground in concrete vaults with control and electrical equipment located above ground in a fenced and secured area above the pump station. As shown in Figure 2-2 in Chapter 2, Project Description, one pump station would be located within Zone 1 and one within Zone 2. Two miles of 12-inch diameter force main would connect the Zone 1 and Zone 2 pump stations and a seven mile long 14-inch diameter force main would connect the Zone 2 pump station to the point of connection with the UNWI at the intersection of Elkhorn Blvd. and W. 6th Street in Sacramento County. Zone 1 and Zone 2 could be developed independently or concurrently. An odor control building may be constructed to control odors at the force main point of connection with the UNWI. The odor control facility would consist of exhaust fans and a

carbon filtering system located in a 2,500 square-foot building directly adjacent to the existing UNWI easement area at the southwest corner of Elkhorn Blvd. and W. 6th Street.

Construction activity noise levels at the two pump station and along the force main alignment would fluctuate depending on the particular type, number, and duration of the uses of various pieces of construction equipment. Installation of the pump stations, and force main would be anticipated to begin in spring 2017 and would be completed by late fall 2017, with a duration of approximately three to four months for construction of the force main and odor control facility and up to six to eight months for construction of the pump stations. Construction work times would occur Monday through Friday from 7:00 a.m. to 6:00 p.m. and Saturday from 8:00 a.m. and 5:00 p.m. The proposed project involves activities that would use heavy equipment such as dump trucks, excavators, cement trucks and mixers, pumps, bull dozers, backhoes, generators and trucks. It is anticipated that the construction of the pump stations and installation of the force main would require a construction crew consisting of an average of six and 20 construction workers over the duration of the construction period, respectively. **Table 3.6-11** shows typical noise levels produced by various types of construction equipment that are expected to be used during construction.

TABLE 3.6-11.
TYPICAL NOISE LEVELS FROM CONSTRUCTION EQUIPMENT

Type of Equipment	L_{max}, dBA	Hourly L_{eq}, dBA/% Use
Bulldozer	85	81/40%
Trencher	85	78/20%
Excavator	85	81/40%
Backhoe	80	76/40%
Loader	80	76/40%
Compactor	80	73/20%
Generator	82	79/50%

SOURCE: Federal Highway Administration (FHWA), Roadway Construction Noise Model User's Guide, 2006.

As previously discussed in the *Regulatory Setting* discussion in Section 3.6.2, above, Sutter County, Sacramento County and Placer County have their own respective construction exemption hours, which are summarized in **Table 3.6-12**. Construction that occurs within these hours would not result in significant construction noise impacts. Since the proposed project construction hours would occur within the construction exemption hours listed in Table 3.6-12, noise generated by the proposed project would not violate the Sutter, Placer, or Sacramento County noise standards. In addition, because construction would only occur during the daytime hours, when the ambient noise levels are their highest, construction noise would not result in a substantial noise increase.

TABLE 3.6-12.
CONSTRUCTION EXEMPT HOURS
FOR SUTTER, PLACER AND SACRAMENTO COUNTIES

County	Construction Except Hours
Sutter	Between 7:00 a.m. and 6:00 p.m. on weekdays, 8:00 a.m. and 5:00 p.m. on Saturdays, and prohibit construction on Sundays and holidays.
Placer	Between 6:00 a.m. and 8:00 p.m., Monday through Friday, and between 8:00 a.m. and 8:00 p.m. Saturday and Sunday.
Sacramento	Between the hours of 8:00 p.m. and 6:00 a.m. on weekdays and Friday commencing at 8:00 p.m. through and including 7:00 a.m. on Saturday; Saturdays commencing at 8:00 p.m. through and including 7:00 a.m. on the next following Sunday and on each Sunday after the hour of 8:00 p.m.

SOURCES: Sutter County, 2011. Sutter County General Plan. 2011; Placer County Municipal Code, Article 9.36; Sacramento County Municipal Code, Chapter 6.68.

Pump Station Construction

As shown in Table 3.6-11, the highest noise levels would be during excavation and trenching activities, which would produce noise levels of approximately 85 dBA L_{max} from 50 feet. The nearest sensitive receptor to the pump stations is approximated 1,000 feet east of the easternmost pump station. Noise from construction activities generally attenuates at a rate of 6 to 7.5 dBA per doubling of distance. Based on the Project site layout and terrain, this analysis assumes an attenuation rate of 7.5 dBA for construction-related noise. Assuming an attenuation rate of 7.5 dBA per doubling of distance, the nearest sensitive receptor near pump station and trenching construction would be exposed to a noise level of 52 dBA L_{max}.

According to the Sutter County General Plan (Policy N 1.6), construction activities within 1,000 feet of a sensitive receptor must limit construction noise to the daytime hours between 7:00 a.m. and 6:00 p.m. on weekdays, 8:00 a.m. and 5:00 p.m. on Saturdays, and prohibit construction on Sundays and holidays unless permission for the latter has been applied for and granted by the County (see Table 3.6-12). The proposed pump station is located within 1,000 feet from the nearest sensitive receptor. However, the project would comply with Sutter County's allowed construction hours. Therefore, the nearest sensitive receptor would be exposed to construction noise levels that would not violate Sutter County's construction noise standards. In addition, because construction would only occur during the daytime hours, when the ambient noise levels are their highest, construction noise would not result in a substantial noise increase.

Force Main Construction

Force main construction would proceed at a rate of 1,000 feet per day. Residences would be exposed to increased noise from construction for a limited duration of approximately six months. The loudest piece of construction that would be used during the installation of the force main would be the trencher, which can generate noise levels of approximately 85 dBA L_{max} from 50 feet. The installation of the force main from the SPSP to the UNWI (near the intersection of W. 6th Street and Elkhorn Boulevard) would transverse through the communities of Rio Linda and Elverta, where construction activities could occur within 50 feet from the nearest sensitive

receptor. Assuming an attenuation rate of 7.5 dBA per doubling of distance, the nearest sensitive receptors to trenching activities would be exposed to a noise level of approximately 85 dBA L_{max}.

Construction of the force main would occur Monday through Friday from 7:00 a.m. to 6:00 p.m. and Saturday from 8:00 a.m. and 5:00 p.m. Since the proposed project construction hours would occur within the construction exemption hours listed in Table 3.6-12, noise generated by the proposed project would not violate the Sutter, Placer, or Sacramento County noise standards. In addition, because construction would only occur during the daytime hours, when the ambient noise levels are their highest, construction noise would not result in a substantial noise increase. Consequently, the project would result in a less-than-significant impact.

Future Facilities

The proposed future facilities include a central pump station south of W. Riego Road and dual force mains along the same pipeline route as the initial facilities and, thus, located in the same agricultural and rural and low-density residential areas. Although the construction schedules of the future facilities are unknown at this time, it is expected that they would require the use of the same off-road construction equipment that would be used during the construction of the initial facilities. This would result in very similar construction noise as the initial facilities. Construction of the future facilities would likely occur Monday through Friday from 7:00 a.m. to 6:00 p.m. and Saturday from 8:00 a.m. and 5:00 p.m. Since the proposed project construction hours would occur within the construction exemption hours listed in Table 3.6-12, noise generated by the proposed project would not violate the Sutter, Placer, or Sacramento County noise standards. In addition, because construction would only occur during the daytime hours, when the ambient noise levels are their highest, construction noise would not result in a substantial noise increase. Consequently, the project would result in a less-than-significant impact.

Summary

For all phases of development, construction and installation of proposed project facilities would occur within the Sutter County's construction exempt hours. In addition, because construction would only occur during the daytime hours, when the ambient noise levels are their highest, construction noise would not result in a substantial noise increase and this impact would be ***less than significant***.

Mitigation Measure

None required.

Impact 3.6-2: Project operation could expose persons to or generate noise levels in excess of standards established in the local general plans or noise ordinances, or applicable standards of other agencies.

Operational traffic would be limited to intermittent maintenance activities, requiring employee trips periodically for routine inspection and maintenance. Crews would perform pump station maintenance activities annual, quarterly, and monthly. These activities would be limited and distributed among all well sites, and therefore would not lead to a 3 dBA increase in ambient noise over existing conditions.

Initial Facilities

Operational activities at each pump station would include two electric pumps and one diesel powered emergency backup generator. The two electric pumps are assumed to have a power output of approximately 52 to 290 horse power with a speed range of 1,600 to 1,800 revolutions per minute (rpm). The electric pump stations would be located as close as approximately 1,000 feet from the nearest sensitive receptor. The maximum sound level generated by each pump station would be 81 dBA at a distance of 3 feet (Bies, 2009). Diesel-powered emergency backup generators would power the pumps during power outages. The maximum sound level generated by the generators would be 90 dBA at a distance of 3 feet (Bies, 2009). According to FRAQMD Rule 3.22, the use of emergency standby engines used for maintenance and testing purpose are not allowed to exceed 100 hours per year. To comply with FRAQMD Rule 3.22, the emergency backup generators are expected to operate 100 hours per year during routine maintenance testing. The combined noise exposure level from both the electric pump and emergency backup generator at each of the pump stations would be approximately 27 dBA at the nearest sensitive receptor. The electric pumps at each of the pump stations would be located underground and fully enclosed, which would attenuate the noise generated by the pumps as much as 5 to 20 dB, reducing operating noise levels to below both the Counties of Sutter, Placer and Sacramento noise standards for stationary sources. Therefore, operation of the on-site electric pump and emergency backup generator at each of the pump stations would result in a less-than-significant impact.

Future Facilities

The specifications of pumps and emergency backup generators are expected to be very similar to those proposed within the initial facilities. Since the location of the future pump station would be located south of W. Riego Rd., it was assumed for this analysis that the nearest sensitive receptors that would be located approximately 1,000 feet north of the road in the Zone 1 development area. The combined noise exposure level from both the electric pumps and emergency backup generator at the future pump station would be approximately 27 dBA at the nearest sensitive receptor. The electric pumps at the pump station would be located underground and fully enclosed, which would attenuate the noise generated by the pumps as much as 5 to 20 dB, reducing operating noise levels to below both the Counties of Sutter, Placer and Sacramento noise standards for stationary sources. Therefore, operation of the on-site electric pumps and

emergency backup generator at each of the pump stations would result in a less-than-significant impact.

Summary

Since the nearest sensitive receptor to the pump stations and emergency backup generators would not be exposed to operational noise levels that would exceed the Sutter County noise standard, this impact would be ***less than significant***.

Mitigation Measure

None required.

Impact 3.6-3: Project construction would expose persons to or generate excessive ground-borne vibration or ground-borne noise levels.

Initial Facilities

Construction

The proposed project would include activities such as excavation, construction of facilities, horizontal directional drilling, jack and bore, trenching and pipeline installation. Construction activities may generate perceptible vibration when heavy equipment is used. Construction of the project would not require pile driving, which can cause excessive vibration.

The use of bulldozers or other heavy equipment during grading and trenching would be expected to generate the highest vibration levels during construction. Vibration levels would vary depending on soil conditions, construction methods, and equipment used. Large bulldozers typically generate vibration levels of 78 VdB and 0.045 in/sec PPV at a distance of 50 feet (FTA, 2006), which would be below the 80 VdB threshold for human annoyance and the 0.2 PPV threshold for building damage. Consequently, existing residences near the proposed pump station construction and installation of the force main would not be affected by substantial ground-borne vibration and this impact would be considered less than significant.

Operations

Operation of the initial facilities would not generate ground-borne vibrations or ground-borne noise levels, and there would be no impact.

Future Facilities

As previously discussed in Impact 3.6-1 and Impact 3.6-2, construction and operational activities associated with the future facilities would be very similar to those under the initial facilities. Construction of the future facilities would use the same off-road equipment as those proposed under the initial facilities, which would result in less-than-significant impacts from construction-related vibration, similar to the initial facilities.

Operations

Operation of the future facilities would not generate ground-borne vibrations or ground-borne noise levels, and there would be no impact.

Summary

Since operational- and construction-related vibration levels at both the initial and future facilities would not exceed the FTA's threshold for human annoyance or building damage at the nearest sensitive receptor, this impact would be ***less than significant***.

Mitigation Measure

None required.

CHAPTER 4
Alternatives

4.1 Introduction

Section 15126.6 of the CEQA Guidelines require an evaluation of "a range of reasonable alternatives to the project, or the location of the project, which would feasibly attain most of the basic project objectives but would avoid or substantially lessen any of the significant effects, and evaluate the comparative merits of the alternatives." The purpose of the alternatives analysis is to determine whether or not a variation of the proposed project would reduce or eliminate significant project impacts in the basic framework of the project's objectives. The alternatives analysis should also discuss the comparative merits of the alternatives. The focus and definition of the alternatives evaluated in this EIR is governed by the "rule of reason" in accordance with section 15126.6(f) of the CEQA Guidelines requiring evaluation of only those alternatives "necessary to permit a reasoned choice." The feasibility of an alternative is ultimately determined by the lead agency based on a variety of factors including, but not limited to, site suitability, economic viability, availability of infrastructure, general plan consistency, other plans or regulatory limitations, jurisdictional boundaries, and site accessibility and control (State CEQA Guidelines section 15126.6(f)(1)). Further, an EIR "need not consider an alternative whose effect cannot be reasonably ascertained and whose implementation is remote and speculative".

As described in Chapter 1, Introduction, the *Sutter Pointe Specific Plan Sewer Master Plan* (2008 Sewer Master Plan) (MacKay & Somps, 2008) was prepared for the SPSP. The 2008 Sewer Master Plan estimated wastewater demand from development of the SPSP and presented various options for providing wastewater service to the SPSP area. It identified on- and off-site infrastructure needs for the options. The 2008 Sewer Master Plan: (1) concluded that the preferred options would be to extend service from the Regional San system; (2) confirmed the ability of the County to connect the Regional San system; and (3) confirmed the ability of Regional San to accept wastewater flows from the SPSP area. The 2009 SPSP EIR evaluated the impacts on the environment from construction of on- and off-site wastewater conveyance infrastructure of extending service from the Regional San system to serve the SPSP presented in the 2008 Sewer Master Plan. The 2008 Sewer Master Plan also included an analysis of two alternatives for providing wastewater treatment and conveyance.

Information is provided below summarizing the two alternatives evaluated in the 2008 Sewer Master Plan and why they were determined to not be viable for providing wastewater conveyance and treatment to the SPSP area (Section 4.2). Based on the conclusions provided in the 2008

Sewer Master Plan, one alternative is evaluated in this Tiered EIR – the No Project Alternative, and that discussion is presented in Section 4.3. The CEQA Guidelines also requires that the "environmentally superior alternative" be identified in the EIR. Section 4.4 identifies the environmentally superior alternative.

4.2 2008 Sewer Master Plan Alternatives

The 2008 Sewer Master Plan also included an analysis of two alternatives for providing wastewater treatment and conveyance:

- On-site wastewater treatment, and
- Wastewater discharge to WWTPs in western Placer County

Each of these alternatives and the reasons why they were not considered viable is presented below.

4.2.1 On-site Wastewater Treatment Facility

This alternative consisted of an on-site tertiary wastewater treatment plant in the western portion of the SPSP area with a pipeline constructed to discharge treated effluent into the Sacramento River. As presented in the 2008 Sewer Master Plan, the Basin Plan of the Central Valley RWQCB prohibits discharge of wastewater upstream of Sacramento metropolitan area and a NPDES waste discharge permit for the disposal of tertiary treated wastewater, even though technically achievable from a water quality perspective, would be anticipated to take considerable effort. Furthermore, the discharge point would be upstream of existing (West Sacramento, Davis, Woodland, and the East Bay Municipal Utilities District), and future intakes (e.g., North Bay Alternate Intake Project) serving other municipalities. The 2008 Sewer Master Plan found that the complexity and lengthy entitlement and permitting process to obtain a NPDES waste discharge permit for a project that would be in conflict with the Basin Plan requirements could be difficult to achieve. In addition, buffer areas would be required to be established around the on-site wastewater treatment plant to minimize potential land use conflicts which would require rezoning of the adopted SPSP. Therefore, it was concluded that while it may be technically feasible to design and construct a tertiary treatment plant, significant permitting, environmental and political issues would need to be resolved; and therefore, it was determined that this was not considered a viable alternatives for the SPSP.

4.2.2 Wastewater Discharge to WWTPs in Western Placer County

This alternative consisted of three components: (1) wastewater treatment would be provided by the City of Roseville at the Pleasant Grove wastewater treatment plant (PGWWTP) or Dry Creek wastewater treatment plant (DCWWTP); (2) a force main system would convey raw wastewater to the PGWWTP or DCWWTP located six and nine miles east of the SPSP area, respectively. Force main routes would follow existing road rights of way for approximately 10.5 to 12 miles to

the PGWWTP or DCWWTP, respectively, in western Placer County. The City of Roseville operates both of these WWTPs for the South Placer Wastewater Authority (SPWA), which includes the city of Roseville, Placer County and South Placer Municipal Utility District. In order to implement this alternative, Sutter County would need to be annexed to the SPWA service area. In addition, there is not current capacity at the nearest point of connection or at the two WWTPs to adequately convey and treat flows from the SPSP area so upgrades to the existing system would be required. Furthermore, both WWTP currently discharge tertiary treated effluent to local ephemeral streams that eventually flow to the Sacramento River. Additional flows associated with the SPSP could result in significant water quality impacts. As a result, the 2008 Sewer Master Plan concluded that while a solution to expand treatment capacity at the PGWWTP or DCWWTP could be engineered and constructed, significant jurisdictional and environmental impacts would occur; therefore, this was not considered a viable alternative for the SPSP.

4.3 Alternatives Analysis

4.3.1 Alternatives Considered but Rejected

As discussed above, the alternatives evaluated in the 2008 Sewer Master Plan were determined to not be viable. In addition to the technical, regulatory and political feasibility of the two alternatives, they would result in new or substantially more severe impacts that those identified for the proposed project. For example, both alternatives would result in greater air quality and noise impacts during construction due to the extent of new and/or modified treatment and conveyance infrastructure that would need to be developed. Furthermore, the discharge of tertiary treated effluent could result in new water quality impacts to receiving waters (the Sacramento River) that would not occur when compared to the proposed project. Finally, these alternatives could achieve some, but not all of the proposed project objectives (see subsection 2.3 in Chapter 2 Project Description). The development of an on-site wastewater treatment plant could result in rezoning of the currently adopted SPSP. The alternative to discharge to City of Roseville WWTP facilities would adversely affect the capacity of existing conveyance and treatment facilities. Both could conflict with regional resource conservation and land use plans. Therefore, these alternatives were considered but rejected from further analysis in this EIR.

4.3.2 No Project Alternative

CEQA Guidelines Section 15126.6(e) requires that an EIR's no project analysis should discuss what would reasonably be expected to occur in the foreseeable future if the proposed project were not approved, based on current plans and consistent with available infrastructure and community services. This analysis discusses the existing conditions at the time the NOP for the proposed project was published (January 2016), as well as what reasonably would be expected to occur in the foreseeable future. The EIR for the SPSP was certified by the Sutter County Board of Supervisors on June 30, 2009 and the SPSP was approved. The SPSP included development of on- and off-site infrastructure to convey wastewater flows from the SPSP area to the SRWTP and the 2009 SPSP EIR evaluated the impacts on the environment from construction of on- and off-

site wastewater conveyance infrastructure. In 2009, the County and Regional San entered into an agreement-in-principal (Principles of Agreement) to convey wastewater flows generated within the SPSP area to the UNWI for treatment at the SRWTP and discharge to the Sacramento River. The Principles of Agreement set forth the basic terms and conditions under which Regional San would extend service to the SPSP area. It also established the framework for a future service agreement which is the Wastewater Service by Contract and Operating Agreement. The Agreement is described further in Chapter 2, Project Description.

Under the No Project Alternative, wastewater service would not be extended from the UNWI for treatment and disposal at the SRWTP. Wastewater service to the SPSP area would not be provided by Regional San and SASD under a Wastewater Service by Contract and Operating Agreement by and between Sutter County, Regional San and SASD. None of the proposed on- and off-site facilities would be constructed or operated. As discussed above, alternatives to serving the SPSP area by a municipal wastewater collection and treatment system were considered but rejected as part of the 2008 Sewer Master Plan for the SPSP because they would result in new or more severe environmental impacts and would achieve some but not all of the proposed project objectives. An option under the No Project Alternative could be to install and operate individual septic systems; however, this would likely not be technically feasible (not provide adequate treatment or treatment capacity) and would result in new and additional impacts when compared to the proposed project including, but not limited to, groundwater quality, biological resources, and land use consistency.

The No Project Alternative would not achieve any of the proposed project objectives. It would not: (1) provide adequate wastewater conveyance, treatment and discharge to support buildout of the SPSP area in compliance with the SPSP and Sewer Master Plan; (2) it could adversely affect the conveyance or treatment capacity of existing facilities; and, (3) it might not comply with the Natomas Basin Habitat Conservation Plan, Sacramento Area Flood Control Agency flood control plans, and other regional resource conservation and land use plans.

4.4 Environmentally Superior EIR

CEQA requires identification of an environmental superior alternative; that is, the alternative that has the least significant impacts on the environment. The CEQA Guidelines Section 15126.6 (e)(2) states that: “If the environmentally superior alternative is the “no project” alternative, the EIR shall also identify an environmentally superior alternative among the other alternatives.” As discussed above, when compared to the proposed project, the No Project Alternative would result in new or more severe impacts when compared to the proposed project. Furthermore, it would not meet the proposed project objectives. Therefore, the proposed project is the environmentally superior alternative.

CHAPTER 5
Other CEQA Considerations

As discussed in Chapter 1, this Focused Tiered EIR is tiered from the 2009 SPSP EIR (SCH #2007032157) and incorporates by reference relevant information from SPSP EIR. As further discussed, tiering allows this Focused Tiered EIR to rely on the SPSP EIR for long-term cumulative impacts and overall growth-related issues. Therefore, Section 5.1 Growth Inducing Impacts and Section 5.2, Cumulative Impacts incorporates by reference the analyses contained in Chapter 6 of the 2009 SPSP EIR.

5.1 Growth Inducing Impacts

5.1.1 CEQA Definition of Growth Inducement

The CEQA Guidelines require that an EIR evaluate the growth-inducing impacts of a proposed project (Section 15126.2[d]). A growth-inducing impact is defined by the CEQA Guidelines as:

> [T]he ways in which the proposed project could foster economic or population growth, or the construction of additional housing, either directly or indirectly, in the surrounding environment. Included in this are projects which would remove obstacles to population growth... It must not be assumed that growth in any area is necessarily beneficial, detrimental, or of little significance to the environment.

A project can have direct and/or indirect growth inducement potential. Direct growth inducement would result if a project resulted in establishing a new demand for public services, facilities, or infrastructure, such as construction of new housing. A project can have indirect or secondary growth-inducement potential if it would establish substantial new permanent employment opportunities (e.g., commercial, industrial or governmental enterprises) or if it would involve a substantial construction effort with substantial short-term employment opportunities and indirectly stimulate the need for additional housing and services to support the new employment demand. Similarly, as explained in the CEQA Guidelines, a project would indirectly induce growth if it would remove an obstacle to additional growth and development, such as removing a constraint or increasing the capacity of a required public service, such as providing wastewater conveyance and treatment capacity.

5.1.2 Approach to Analyzing Growth Inducing Effects

According to CEQA Guidelines Section 15126.2(d), growth inducement is not in and of itself an "environmental impact", however growth can result in adverse environmental consequences.

Growth inducement may constitute an adverse impact if the growth is not consistent with or accommodated by the land use plans and policies for the affected area. Local land use plans, typically general plans, provide for land use development patterns and growth policies that allow for the "orderly" expansion of urban development supported by adequate urban public services, such as water supply, sewer service, and new roadway infrastructure. A project that would induce "disorderly" growth (i.e., a project in conflict with local land use plans) could indirectly cause adverse environmental impacts, for example, loss of agricultural land that has not been addressed in the planning process. To assess whether a project with the potential to induce growth is expected to result in significant impacts, it is important to assess the degree to which the growth associated with a project would or would not be consistent with applicable land use plans.

5.1.3 Overview of the Induced Growth Potential

Providing wastewater service is one of the primary public services needed to support population growth and development. The proposed project would develop the infrastructure necessary to provide wastewater conveyance and treatment to the SPSP Area through buildout (2030). The proposed project would be built in phases over the life of the SPSP buildout, with the initial facilities (i.e., pump stations 1 and 2 and force main) being in the Phase I. Some facilities, such as the future central pump station, would be sized for full buildout of project development in a later phase. Therefore, the proposed project could remove an obstacle to population growth because phased facilities would be sized to accommodate full buildout of the SPSP area. As described above, the significance of this growth inducing potential is determined if the proposed project would or would not be consistent with applicable land use plans. The following discusses the relationship of the proposed project with the growth planned for by the Sutter County General Plan, Measure M objectives, and the approved SPSP.

Sutter County General Plan

The 1996 Sutter County General Plan designated 9,500 acres in South Sutter County, including the SPSP area and supporting infrastructure allowing for growth, as approved and adopted as part of the Sutter County General Plan. In addition, the current Sutter County General Plan, approved and adopted in 2011, identified the SPSP area, specifically for a master planned development, including all required utilities to serve the area.

Measure M

In November of 2004, Sutter County voters approved Measure M, an advisory measure that gave the Board of Supervisors direction for the planning of growth on approximately 7,500 acres in South Sutter County known as the Sutter Point Area. Measure M identified the development of a mix of land uses, including industry, commerce, education, housing, recreation, and open space and would be integrated within the NBHCP (Sutter County, 2009).

Sutter Pointe Specific Plan and EIR

The SPSP was adopted and an EIR was certified in 2009 by the Sutter County Board of Supervisors. The 2009 SPSP EIR included a programmatic assessment of development of the entire SPSP area, including on- and off-site wastewater infrastructure. The 2009 SPSP EIR stated that it was the intent of the County to form a CSD or other County-related entity to provide wastewater service for the SPSP area but also identified the intent to have SASD and Regional San to provide wastewater service from the point of connection and treatment at the SRWWTP.

The SPSP would include development of 17,500 new residential units and 3.627 acres of commercial and industrial land uses at buildout. The SPSP would support an estimated population of 46,900 new residents and would create 57,651 jobs. The 2009 SPSP EIR noted that development of the SPSP would be growth inducing because it would involve improving public utilities and services including the construction of roadways into undeveloped areas, the provision of school capacity beyond that needed to serve the SPSP, an increase in demand for goods and services in Sutter County and the Sacramento region, and increased pressure on adjacent agricultural lands to convert to urban uses. The 2009 SPSP EIR found the growth induced by the development of the SPSP has been evaluated and provided for in the Sutter County General Plan, NBHCP, and other relevant City, County, and regional planning documents (Sutter County, 2008).

5.1.4 Potential Growth Inducement of the Project

As discussed on page 6-4 and 6-5 of the 2009 SPSP EIR, the proposed on-site sewer system would be constructed specifically to serve the proposed project and would be sized to accommodate planned project sewer flows. Initially, wastewater from the SPSP area Phase I development would be pumped through a sewer force main, with future development to be served by a future pump station and additional force main.

The off-site portion of the sewer force mains would extend through areas of agricultural and low-density rural residential land uses (see Figure 2-2 in Chapter 2, Project Description). Construction of these force mains could potentially remove an obstacle to growth by adding a sewer line through an undeveloped area; however, the sewer force mains would be sized to accommodate the sewer flows of only the SPSP and would not have capacity to serve areas outside the SPSP area. In addition, the off-site sewer force mains are located outside of the NBHCP permit area, which provides an additional constraint to growth.

The two force mains would connect with Regional San's UNWI. Construction of the UNWI was required to serve regional development and was required whether or not the SPSP would be developed. Construction of the UNWI, with the capacity to serve the predicted high growth at that time, resulted in the current capacity available to serve the SPSP and other planned regional development and, therefore, was considered growth inducing in the 2009 SPSP EIR.

Sutter County has negotiated an agreement with SASD and Regional San to provide sewer service to the SPSP area. Collected wastewater flows from the SPSP would ultimately be transported to the SRWWTP for treatment and disposal. The SRWTP receives and treats an ADWF flow of 106 mgd (as of 2014), with a maximum treatment ADWF capacity of 218 and a permitted ADWF discharge capacity of 181 mgd. Flows to the SRWTP would increase over time as the population in the Regional San service area increases. According to the Sacramento Regional Wastewater Treatment Plant 2020 Master Plan (2020 Master Plan), the permitted capacity of the SRWTP was expected to be reached before 2010. However, the rate of growth in demand substantially slowed, and flows to the SRWTP have consistently decreased between 2000 and 2014, from 155 mgd to 106 mgd. Based on this trend, the SRWTP is able to provide capacity to future development beyond what was originally anticipated and there is no threat that permitted capacity will be reached over the next several decades (probably to 2060) (MacKay & Somps, 2015).

Upgrades to the SRWTP would occur without development of the proposed project, are required to serve regional development, and would be needed whether or not the proposed project is developed. Expansion of the SRWTP is planned to be phased to provide for sufficient long-term capacity for regional development. Over time, additional planning at the SRWTP would occur, and overall capacity would be assessed and additional capacity planned for and added. Because the SRWTP is planned to accommodate growth in the region, development in the SPSP area would be accommodated by planned SRWTP capacity.

The proposed infrastructure would allow population growth to occur within the scope of both the SPSP and the Sutter County General Plan. It would not support development densities higher than those allowed in these adopted plans. Therefore, the proposed project would not induce growth above what has been planned for by Sutter County and evaluated within the Sutter County General Plan and the 2009 SPSP EIR; and therefore, the proposed project would not be growth-inducing.

5.2 Cumulative Impacts

5.2.1 Methodology

A project may have significant environmental effects when viewed in connection with the effects of past, other current and probable future projects. CEQA Guidelines Section 15065(a)(3) and 15130(a) define these effects as “cumulatively considerable,” and require that these impacts are discussed within an EIR, including applicable mitigation measures to reduce the project’s contribution to the cumulative effects.

Section 15130(b) of the CEQA Guidelines states that the following three elements are necessary to an adequate discussion of significant cumulative impacts:

- Either: (A) a list of past, present, and probable future projects producing related or cumulative impacts, including those projects outside the control of the Lead Agency (i.e., the list approach); or (B) a summary of projections contained in an adopted general plan or in a prior environmental document which has been adopted or certified, which described or evaluated regional or area wide conditions contributing to the cumulative impact (i.e., the plan approach). Any such planning document shall be referenced and made available to the public at a location specified by the Lead Agency.

- A summary of expected environmental effects to be produced by those projects with specific reference to additional information stating where that information is available.

- A reasonable analysis of the cumulative impacts of the relevant projects. An EIR shall examine reasonable, feasible options for mitigating or avoiding the Project's contribution to any significant cumulative effects.

Tiering from a previous EIR allows Sutter County, as the lead agency, the ability to determine if significant environmental effects were adequately examined at a sufficient level of detail in the 2009 SPSP EIR, including cumulative impacts. Further, CEQA Guidelines Section 15168(c)(5) allows Sutter County to simplify the preparation of environmental documents on later parts of the 2009 SPSP EIR through incorporation by reference to deal with regional influences, secondary effects, cumulative impacts, broad alternatives, and other factors that apply to the 2009 SPSP EIR as a whole. Because the route selection and other wastewater infrastructure details were analyzed and approved in the 2009 SPSP EIR, and the County adopted a Finding of Fact and Overriding Considerations for identified significant and significant and unavoidable, cumulative impacts were adequately analyzed in the 2009 SPSP EIR and further detailed analysis in this Focused Tiered EIR is not required. The past, present, and probable future projects listed in Chapter 6 of the 2009 SPSP EIR are located within the vicinity of the proposed project and would affect the same environmental resources as the proposed project. Because the proposed project would not result in new or more severe significant impacts, the cumulative impact analyses and mitigation measures from the 2009 SPSP EIR, as incorporated within this Focused Tiered EIR, would remain applicable, as updated, to mitigate proposed project impacts to less than considerable levels. The following is a summary of the cumulative context from pages 5-4 through 5-12 in Chapter 5 of the 2009 SPSP EIR incorporated by reference, and updated as applicable.

5.2.2 Description of Cumulative Projects

Sutter Pointe Specific Plan

The SPSP provides direction for a 7,500-acre master-planned community (commercial, industrial, and residential developments) proposed for future development in the area. Cumulative impacts were analyzed within the context of concurrent development of the project with development of the surrounding land. The proposed project intends to provide wastewater conveyance for this development (Sutter County, 2009).

Metro Air Park

Metro Air Park, located just east of Sacramento International Airport, is a 1,892-acre, mixed-use, commercial and industrial park. It will ultimately include 20 million square feet of space under roof, as well as an 18-hole golf course. Development is planned to be completed in six phases. Cumulative impacts were analyzed within the context of concurrent development of the project with development of the surrounding land (Sutter County, 2009).

Greenbriar

The Greenbriar project consists of development of a 577-acre site at the northwest corner of the Interstate 5/SR 99 interchange, between Metro Air Park on the west and the current limits of North Natomas Community Plan (NNCP) planning area on the east. The Greenbriar project would develop land outside of the area designated for urbanization in the NBHCP. The proposed land use plan is a predominantly residential development with open space and water features. The project includes approximately 3,000 residential dwelling units and approximately 32 acres of retail and commercial space would be provided on site. In addition, the Greenbriar project includes 144 acres of public uses, such as parks and open space. The Greenbriar project was approved by the City of Sacramento in May 2008, and is undergoing revisions under a tier 2 entitlement process with the City.

Placer Vineyards

The Placer Vineyards Specific Plan area encompasses approximately 5,230 acres in the southwest corner of Placer County. At buildout, the Placer Vineyards Specific Plan would include 14,132 dwelling units; 274 acres of commercial development; and 1,560 acres of parks, open space, schools, and major roadways. The Placer County Board of Supervisors approved the Placer Vineyards Specific Plan in July 2007 and construction is projected to occur over a 20 to 30 year time frame (Sutter County, 2009).

Elverta Specific Plan

The Elverta Specific Plan area includes 1,744 acres in the north-central portion of Sacramento County and approximately 10 miles northeast of downtown Sacramento. The Rio Linda/Elverta Specific Plan includes the development of 881 acres of urban residential land uses and 552 acres of agricultural-residential land uses with an anticipated total number of 4,950 dwelling units. In addition, the Rio Linda/Elverta Specific Plan includes 19.4 acres of commercial and office/ professional land uses; and 303 acres of parks, open space, schools, and detention facilities (Sacramento County, 2007).

Natomas Basin Habitat Conservation Plan

The Natomas Basin Conservancy acquires and manages mitigation land under the Natomas Basin Habitat Conservation Plan (HCP). The purpose of the HCP is to provide a sanctuary and refuge for species displaced by development in the Natomas Basin. Under the terms of the HCP, 8,750 acres of land are to be acquired to mitigate the loss of 17,500 acres of land to be developed. As

2006 came to an end, the Natomas Basin Conservancy had acquired approximately half the land needed to implement the HCP. Development of the proposed project is considered a covered activity per the incidental take permit issued as part of the HCP (Sutter County, 2009).

Natomas Levee Improvement Program

In 2007, the Sacramento Area Flood Control Agency (SAFCA) released a Final EIR on its proposed assessment district to fund the local share of the Natomas Levee Improvement Program (NLIP). The EIR identified many NLIP features spanning several phases analyzed at both a programmatic and project specific level. Affected areas included the east levee of the Sacramento River, the south levee of the Natomas Cross Canal, and the west levees of the Pleasant Grove Creek Canal (PGCC) and the NEMDC.

SAFCA prepared, approved and certified several EIR's for various phases of the project that have since been constructed. Several segments of the NLIP are still in the design and construction phase.

Natomas North Precinct Master Plan

On April 28, 2016 Sacramento County published the NOP on the Natomas North Precinct Master Plan (NNPMP). The NNPMP is an approximately 5,699-acre mixed-use project located in the Natomas community of unincorporated northwestern Sacramento County, south of Sutter County and southwest of Placer County, east of Highway 99, and north of the City of Sacramento. The NNPMP includes a broad range of residential land uses, as well as commercial and employment land uses and schools, parks and open space to support the residential land uses.

The NNPMP is outside the existing Sacramento County Urban Services Boundary (USB) and Urban Policy Area (UPA). As such, the NNPMP would amend the USB and UPA to include all of the 5,699 acres. In addition, the proposed NNPMP would amend the Sacramento County General Plan Land Use Diagram to change the land use designations within the 5,699 acres from Agricultural Cropland to Low Density Residential (approximately 2,561 acres), Medium Density Residential (approximately 265 acres), Commercial & Office (approximately 703 acres), Public/ Quasi-Public (approximately 242 acres), and Recreation (approximately 1,928 acres). The proposed General Plan Amendment is shown on Plate NOP-6.

Sewer service to the NNPMP is proposed to be provided by the SASD and Regional San. SASD is proposed to provide collection and trunk main services within the urbanized lands, while Regional San is proposed to provide interceptor, treatment and disposal services from the development area to the SRWTP. The urbanizing lands within the NNPMP are proposed to be annexed to SASD and SRCSD.

The Panhandle Project

On April 27, 2016, the City of Sacramento released an NOP for the preparation of an EIR for the Panhandle Annexation and Planned Unit Development (Panhandle Project). The Panhandle

Project is would reorganize (through annexation and related detachments) an area within Sacramento County and establish a Planned Unit Development (PUD) for a portion of the project area. The project area comprises 589.3 acres in unincorporated Sacramento County between West Elkhorn Boulevard on the north, a segment of E. Levee Road that adjoins the Natomas East Main Drainage Canal and Sorrento Road on the east, Interstate 80 (I-80) to the south, and residential development on the west. The project area is within the City of Sacramento's Sphere of Influence and in the NNCP planning area.

The northern portion of the Panhandle Project area would consist of a PUD for a planned community consisting of residential, commercial, elementary school, and park uses on approximately 367 acres north of Del Paso Road. The remaining approximately 168 acres between the proposed PUD project area and extending north to West Elkhorn Boulevard ("Panhandle North") would remain designated as Planned Development (PD) to accommodate residential uses and the East Natomas Education Complex. The land use plan includes the potential for approximately 2,270 residential units in the entire Northern Portion. No land use changes are proposed for the Southern Portion.

Sacramento International Airport Master Plan

The Sacramento International Airport Master Plan addresses future development of the airport to the year 2020 in two phases. The first phase will occur from 2007 through 2013 and the second phase from 2014 through 2020. The Master Plan also includes possible development at the airport in a third phase occurring beyond 2020. Master Plan Improvements include runway extension and widening, development of a new terminal, changing land uses, including about 366 acres of aviation- or non-aviation- related development, 360 acres of commercial development, 114 acres for expansion of ground transportation, 269 acres of land acquisition for the new runway, and 438 acres to prevent encroachment of incompatible uses from the south, and drainage improvements to accommodate expansion and increase in impermeable surfaces. The final EIR for the Sacramento Airport Master Plan was approved by the County of Sacramento Board of Supervisors on July 17, 2007 (SCAS, 2009). Portions of the Master Plan have been completed.

5.2.3 Summary of Cumulative Impacts

As described above, because the route selection and other wastewater infrastructure details were analyzed and approved in the 2009 SPSP EIR and the County adopted a Finding of Fact and Overriding Considerations for identified significant and significant and unavoidable, cumulative impacts were adequately analyzed in the 2009 SPSP EIR and further detailed analysis in this Focused Tiered EIR is not required. The following is a summary of applicable cumulative impacts and the proposed project's contribution to those impacts.

Air Quality and Greenhouse Gas Emissions. Air quality and greenhouse gas emissions impacts of the proposed project include those from construction and operation of the pump stations and force mains. The 2009 SPSP EIR considered the projects listed above, as part of the cumulative impact setting for air quality. On pages 5-14 through 5-16, the 2009 SPSP EIR analyzed

cumulative air quality impacts and concluded that even with mitigation measures there would be a considerable contribution to emissions of criteria pollutants to the SVAB, resulting in a significant cumulative impact on air quality. The proposed project would result in emissions of NO_x, PM_{10} and $PM_{2.5}$ that would not exceed air quality thresholds with mitigation measures. The proposed project, as an element of the SPSP identified in the 2009 SPSP EIR, along with other projects in the SVAB, would result in a considerable contribution to cumulative impacts. Operation of the proposed project would result in indirect emissions from energy suppliers that are estimated to contribute to the significant contribution described in the 2009 SPSP EIR, resulting in a significant cumulative impact. Implementation of Mitigation Measure 3.2-1 (Mitigation Measure 3.4-1 on pages 3.4-28 through 3.4-30 of the 2009 SPSP EIR) would reduce the contribution of the proposed project to this significant cumulative impact to a less than considerable level.

Biological Resources. Impacts to biological resources identified in this Focused Tiered EIR were focused on wetland and riparian habitat within the areas of construction of the proposed pump stations and force mains. On pages he 2009 SPSP EIR concluded that construction impacts to wetlands, in addition to other projects would result in a considerable contribution to a significant cumulative impact, even after application of mitigation measures. The proposed project, as an element of the SPSP identified in the 2009 SPSP EIR, could result in fill of wetlands during construction of the pump stations and force mains. Implementation of Mitigation Measure 3.2-1 (Mitigation Measure 3.13-2 on pages 3.13-34 and 3.13-35, adapted for current regulations, of the 2009 SPSP EIR) would reduce proposed project impacts on wetland and riparian habitats, resulting in a less-than-considerable contribution to cumulative impacts.

Cultural Resources. Impacts to cultural resources identified in this Focused Tiered EIR were focused on those undiscovered resources within the areas of construction of the proposed pump stations and force mains. The 2009 SPSP EIR considered construction impacts to undiscovered cultural resources, in addition to the projects listed above, would result in a considerable contribution to a significant cumulative impact even with application of mitigation measures. The proposed project, as an element of the SPSP identified in the 2009 SPSP EIR, could result in construction impacts on unidentified cultural resources. Implementation of Mitigation Measure 3.2-1 (Mitigation Measure 3.15-2, adapted to current conditions, on page 3.15-24 of the 2009 SPSP EIR) would reduce proposed project impacts on cultural resources, resulting in a less-than-considerable contribution to cumulative impacts.

Noise. Proposed project noise-related impacts include those from construction of the pump stations and force mains, and operation of the emergency generators and odor control facility. The 2009 SPSP EIR considered the construction and operation of the entire SPSP, in addition to the projects listed above, as part of the cumulative impact setting for noise effects. On pages 5-16 through 5-17, the 2009 SPSP EIR concluded that construction noise would not combine with other projects in close enough proximity and at the same time, and, therefore, the SPSP would have a less than considerable contribution to a cumulative impact related to noise from

construction. Likewise, and for the same reasons, operation of stationary-sources of noise (e.g., emergency generators) would be localized and would not be additive with other projects' stationary noise sources and the SPSP would have a less than considerable contribution to significant cumulative impacts on noise. Therefore, the proposed project, as an element of the SPSP identified in the 2009 SPSP EIR would result in a less than considerable contribution to cumulative impacts related to noise.

Wastewater. Impacts related to wastewater conveyance from the proposed project were focused on the capacity of the Regional San UNWI to accept flows from the SPSP. The 2009 SPSP EIR was completed prior to construction and operation of the UNWI system and analyzed, on pages 5-22 through 5-24, the conveyance capacity of the system based on previous high growth estimates resulting in higher wastewater flows to the SRWTP, resulting in a significant cumulative impact. However, the latest information as reported in the MacKay & Somps Capacity Analysis for the proposed project includes modeling of the UNWI system done by SASD using current growth estimates, and concluded that conveyance capacity within the Regional San system is not constrained within the cumulative context of existing and future probable projects in Regional San's service area. Therefore, the proposed project, as an element of the SPSP identified in the 2009 SPSP EIR, would result in a less than considerable contribution to cumulative impacts on wastewater conveyance. Likewise, the MacKay & Somps Capacity Analysis included information from Regional San that confirms that wastewater flows from full buildout of the SPSP, in addition to the projects listed above within the Regional San service area, would not exceed the treatment capacity of the SRWTP, including future expansion, for the foreseeable future planning horizon. Therefore, the proposed project would result in a less than considerable contribution to cumulative effects on wastewater treatment capacity at the SRWTP.

5.3 Significant Irreversible Environmental Changes

The CEQA Guidelines (Section 15126.2[c]) require an evaluation of the significant irreversible environmental changes that would be caused by a project if implemented, as described below:

> Uses of nonrenewable resources during the initial and continued phases of the project may be irreversible since a large commitment of such resources makes removal or nonuse there after unlikely. Primary impacts, and, particularly, secondary impacts (such as highway improvement which provides access to a previously inaccessible area) generally commit future generations to similar uses. Also, irreversible damage can result from environmental accidents associated with the project. Irretrievable commitments of resources should be evaluated to assure that such current consumption is justified.

In general, the CEQA Guidelines refer to the need to evaluate and justify the consumption of nonrenewable resources and the extent to which the project commits future generations to similar uses of nonrenewable resources. In addition, CEQA requires that irreversible damage resulting from an environmental accident associated with the project be evaluated.

Implementation of the proposed project would indirectly result in the commitment of nonrenewable natural resources used in the construction process; gravel, petroleum products, steel, and other materials. The proposed project would also result in the commitment of slowly renewable resources, such as wood products. Operation of the proposed project would also result in commitment of energy resources such as fossil fuels, electricity, and chemicals used within the wastewater conveyance and treatment process. However, the amount of nonrenewable energy resources required to serve the proposed project would be limited. Compliance with all applicable building codes, as well as mitigation measures, planning policies, and standard conservation features would ensue that natural resources are conserved to the maximum extent possible. It is assumed that the rate and amount of energy consumption would not result in the unnecessary, inefficient or wasteful use of resources and would be accomplished in a manner consistent with applicable laws and regulations. It is also possible that new technologies or systems will emerge, or will become more cost-effective or user-friendly, to further reduce the reliance on nonrenewable natural resources.

5.4 Significant Unavoidable Impacts

Public Resources Code Section 21100(b) (2) requires that any significant effect on the environment that cannot be avoided be identified. Additionally, CEQA section 15093(a) allows the lead agency to determine that the benefits of a proposed project outweigh the unavoidable adverse environmental impacts of implementing the project. Under this rule, the Lead Agency may approve a project with unavoidable adverse impacts if it prepares a "Statement of Overriding Considerations" that sets forth specific reasons for making such a decision. The proposed project would not result in significant and unavoidable impacts.

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CHAPTER 6
Draft EIR Authors

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CHAPTER 7
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Appendix A
Principles of Agreement

Contract No. 70403

PRINCIPLES OF AGREEMENT

BETWEEN

COUNTY OF SUTTER

AND

SACRAMENTO REGIONAL COUNTY SANITATION DISTRICT

FOR EXTENSION OF SERVICE TO THE SUTTER POINTE SPECIFIC PLAN AREA

THESE PRINCIPLES OF AGREEMENT (Principles) are established by the SACRAMENTO REGIONAL COUNTY SANTITATION DISTRICT (SRCSD), and the COUNTY OF SUTTER (County), for the purposes of future negotiations of a Wastewater Services Agreement (WWSA). These Principles are an attempt to identify and resolve the potential major issues anticipated in negotiating the WWSA. These Principles are an expression of intent by the SRCSD and the County.

Background

In order to provide an environmentally sound, regional approach to cost-effective wastewater treatment and disposal to the Sutter Pointe Specific Plan (SPSP) area located in Sutter County, the County has submitted a Consideration for Service to the SRCSD.

The County and SRCSD both agree that, based on currently available environmental information and cost information, future wastewater treatment by SRCSD of wastewater created in the SPSP area will benefit the County, SRCSD and the entire region.

The County and SRCSD both further agree that, based on currently available environmental information and cost information, treatment of future wastewater produced in the SPSP area by SRCSD will avoid a multiplicity of service and potentially reduce costs.

These Principles contain the key deal points regarding the extension of SRCSD service to the SPSP area that will be incorporated into subsequent contracts and agreements between the County and SRCSD, provided that, after further environmental review (i.e., review beyond the Environmental Impact Report [EIR] prepared for the proposed SPSP), the parties determine that they still intend to enter into such contracts and agreements.

Principles of Agreement

1. Basis for SRCSD Extension of Sewer Service

The area designated for possible service by these Principles is the 7,528± acre planned development referred to as the SPSP area. The SPSP area designated for service is located adjacent to and north of the Sacramento-Sutter County line as shown in Figure 1.

These Principles were established based on the sewer system criteria provided in the November 14, 2008 Final *Sutter Pointe Specific Plan Sewer Master Plan* (SPSPSMP) prepared by MacKay & Somps Civil Engineers, Inc (MSCE). The SPSP area is identified for urbanization by the County under the terms of Measure M, an advisory measure approved by the voters to allow development of the area as follows:

- 3,600 acres for retail, commercial and industrial uses
- 1,000 acres for schools, parks, public buildings, and open space
- 2,900 acres of residential uses

The proposed SPSP project is more particularly described in the Public Review Draft of the Sutter Pointe Specific Plan (SPSP Plan) dated December 2008 prepared by EDAW. A copy of the SPSP Plan is on file with the Sutter County Planning Department.

Table 1 in Appendix A summarizes the SPSPSMP's equivalent single family dwelling units (ESDs) for each phase of the SPSP area. At build out, the SPSP area is estimated to have 7,528 acres, 36,180 ESDs, and 11.22 million gallons per day (mgd) average dry weather flow (ADWF).

Without prior consent from SRCSD (which shall not be unreasonably withheld), the County may not:

- Increase the tributary ESDs beyond that shown in Table 1; or
- Exceed the ADWF of 11.22 mgd; or
- Significantly deviate from land use designations and flow volumes and rates identified in the SPSP Plan in a manner that could have a material adverse effect on SRCSD's operational system.

Under no circumstances, however, will SRCSD consent to any such increase in service if the probable effect of said increase would materially affect the ability of the SRCSD Contributing Agencies (as defined in Section 21 herein) to make reasonable use, or future use, of SRCSD facilities or to provide local service to its present system users (see Section 21). The impacts from the SPSP wastewater flows on the SRCSD system for the areas, ESDs, and flow rates have been carefully evaluated in the SRCSD Wastewater Conveyance Modeling and Storage Analysis for Measure M Properties prepared by Montgomery Watson Harza (MWH) dated March 17, 2008 (MWH Storage Analysis – Appendix B), and it has been concluded that the SPSP wastewater discharge

will not materially affect the ability of the SRCSD Contributing Agencies to make reasonable use, or future use, of SRCSD facilities or to provide local service to its member agencies. This conclusion is primarily based on the inclusion of the wastewater storage facility in the SPSP wastewater system (see Section 9). A detailed technical discussion of the wastewater flows and storage evaluation is included as Appendix A of these Principles. The technical write-up prepared by MSCE provides detailed information related to the SPSP area wastewater flows and storage requirements.

2. Local Agency Formation Commission Requirements

Upon final approval of these Principles and with approval to proceed from the SRCSD Board, SRCSD shall, within a reasonable amount of time, initiate and coordinate with the Sacramento Local Agency Formation Commission (LAFCo) staff to file an application with LAFCo for a Sphere of Influence Amendment (SOIA) for the SRCSD. Also, SRCSD will file a request to provide new services by contract or agreement outside its jurisdictional boundaries per Government Code 56133, to enable SRCSD to provide service to the SPSP area. LAFCo approval is needed to extend services, by any means, to the SPSP area. As set forth in the next section, such action by LAFCo must be preceded by compliance with the requirements of the California Environmental Quality Act (CEQA) (Public Resources Code § 21000 et seq.), presumably in the form of an EIR or Mitigated Negative Declaration (MND) that builds on the existing analysis in the SPSP EIR and develops additional, more specific information regarding the potential environmental consequences of such an extension of services. The parties acknowledge that, depending on the information developed in such an EIR or MND and in comments submitted by members of the public and/or public agencies, LAFCo and SRCSD may choose not to take any further action, to approve an alternative to the recommended proposal, or to impose additional mitigation requirements not currently anticipated based on existing environmental information, including the SPSP EIR. Furthermore, the parties understand and agree that LAFCo has the discretionary authority in considering the application to approve, deny or conditionally approve the application. These Principles do not in any way change, modify or restrict Sacramento County LAFCo's discretionary authority regarding the application, its CEQA analysis and any other LAFCo action. It is understood by the parties to these Principles that LAFCo may request additional terms and/or impose conditions as a result of the application review process.

The County shall be responsible for payment, collection, and transmittal of all costs associated with processing SRCSD SOIA petition, including, but not limited to the cost of filing the SOIA application and all staff costs associated with processing such application and any costs associated with compliance with environmental laws, including CEQA, associated with the SOIA request.

If the Sacramento LAFCo approves the application with or without conditions, the Sutter LAFCo, and the Sacramento LAFCo if required by law, must approve the WWSA prior to SRCSD commencing any service to the SPSP area.

3. Cooperation in Compliance with the California Environmental Quality Act

The County and SRCSD shall cooperate in any proceedings that may be necessary to ensure that the actions contemplated under these Principles, including those of LAFCo, comply with CEQA. County will reimburse SRCSD for all costs incurred by SRCSD related to any such compliance with CEQA, including, but not limited to, all reasonable legal fees, consultant fees and expenses related to CEQA compliance. The County and SRCSD shall enter into reimbursement agreement(s) that specifies the methods of accounting and reimbursement for such CEQA-related costs as well as any additional terms addressing their cooperation with respect to CEQA.

The parties to this agreement contemplate that CEQA review will be required in the LAFCO SOIA proceedings. For the purposes of the SOIA process, Sacramento LAFCo will be the lead agency, while both the County and SRCSD would be responsible agencies. The parties' goal in working together to prepare an environmental document of use to all parties is to complete a level of analysis sufficient to allow the parties to carry out their various obligations, including the construction of physical facilities, without the need for additional environmental review (other than the site-specific CEQA documents the County may require prior to authorizing individual small-lot tentative subdivision maps or similar entitlements within the SPSP area).

4. Services Provided to the County of Sutter

In exchange for the payment of various rates and fees to SRCSD, SRCSD will provide wastewater conveyance (from the point of connection to the SRCSD Interceptor System established in these Principles), treatment and disposal services to Sutter County, pursuant to Section 25 of these Principles.

5. Definition of SRCSD and County of Sutter Wastewater Facilities

Now and in the future, the County, or Community Services District or other service provider will continue to own and operate its local sewer collection system, force main and all pumping and/or storage facilities (defined in these Principles as the "SPSP Facilities") required to serve the SPSP area, except as otherwise stated in these Principles.

6. Method of Service

The conveyance, treatment, and disposal of wastewater generated from the designated area will be accommodated through the WWSA between the County, via a County Service Area (CSA) or Community Services District (CSD) and SRCSD. County envisions, over time, the obligations of the CSA may be transferred to a future incorporated City, district, or other service provider.

Execution of the WWSA may result in the SPSP area being annexed to SRCSD in the future. If annexed, the WWSA will remain in effect until such time that the County, or a successor public entity, becomes a signatory to the Master Interagency Agreement.

At any point after execution of the WWSA, SRCSD, at its sole discretion, may require the County or a successor public entity to annex into SRCSD, consistent with applicable law and under realistic time frames in light of legal requirements. If such request is made, the County, or a successor public entity, shall immediately take steps to initiate annexation of the SPSP area into SRCSD. At any point after the earliest milestone set forth in Section 9 of these Principles (milestones requiring storage) is triggered, the County, or a successor public entity, may request annexation into SRCSD and SRCSD shall consider such a request.

7. Cost of Service, Construction, Operation, Regulations, Environmental, Other

The County will pay all costs of service to the SPSP area and there will be no financial responsibility on SRCSD ratepayers to cover the cost of providing service to the SPSP area.

The County is responsible for all costs associated with the LAFCo process and required CEQA coordination, as described in these Principles.

The County shall design, construct, operate and maintain, at its expense, all facilities required for the collection storage, conveyance and discharge to the SRCSD wastewater system described in these Principles. This includes all costs to operate as required by all applicable laws and regulations, some of which are described in these Principles. This also includes cost for the final storage analysis.

The County is responsible for all costs, including legal fees, associated with third party action as provided in the indemnification provisions of this agreement.

The County and SRCSD shall enter into reimbursement agreement(s) that specifies the methods of accounting and reimbursement for items related to providing service to the SPSP area as described in these Principles or in a future WWSA.

8. Means of Service

It is currently envisioned that wastewater generated from the SPSP area will be collected and conveyed through existing and planned facilities to the Sacramento Regional Wastewater Treatment Plant (SRWTP) as shown on Figure 1. A force main system (SPSP Force Mains) will be constructed from the SPSP Central Pumping Facility within Sutter County, routed through Sacramento County to the Upper Northwest Interceptor (UNWI) system (in Sacramento County) at the upstream terminus of the UNWI #3 near the intersection of W. 6th Street and Elkhorn Blvd. (Point of Connection). From this point, SRCSD facilities (Interceptor System) will convey the wastewater to the SRWTP for treatment and disposal. Confirmation of the final means of service will occur, if at

all, upon completion of environmental review under CEQA for the proposed SPSP Plan and the additional CEQA review required for subsequent LAFCo and SRCSD actions.

The SPSP wastewater system consists of the following four major components (SPSP Facilities):

(1) **Local Collection System**: A system of gravity sewer collection mains and lift stations located throughout the SPSP area.

(2) **Central Pump Station**: A large central facility that pumps collected wastewater flows from the local collection system and/or wastewater storage facility to the SRCSD Interceptor.

(3) **Wastewater Storage Facility**: A large storage facility that will accept flows from the Central Pump Station during periods when the SRCSD Interceptor System cannot accept flows from Sutter County.

(4) **Wastewater Force Mains (SPSP Force Mains)**: Parallel pressure pipes that will convey the discharge from the Central Pump Station to the SRCSD Interceptor System.

The SRCSD UNWI system has been designed to convey Build-Out peak wet weather flow (PWWF) from development within the Sacramento County Urban Services Boundary (USB).

The County would like to receive sewer service for the designated area by 2011, or earlier. In order to provide service:

- The UNWI system (reaches 1 through 3) downstream of the Point of Connection must be constructed.

The County must facilitate the construction of the SPSP Force Mains.

9. Central Pumping and Storage Facility

The County will be responsible for providing central pumping and storage facilities required to convey the wastewater flows from the SPSP area to the SRCSD Interceptor System. The County will also be responsible for providing facilities required for storage to mitigate the impact on the SRCSD Interceptor System.

The SRCSD Interceptor System can accommodate the ADWF from the SPSP area by utilizing capacity available that provides for PWWF during storm events (Figure 2). Under PWWF conditions, however, the County will need to provide storage volume for the peak flow. This stored wastewater would be discharged into the SRCSD Interceptor System available capacity after the storm event has ended and the flows have subsided.

The SRCSD requires that storage will meet SRCSD's emergency shutdown requirement of the North Natomas Pump Station (NNPS), and SRCSD's PWWF storage requirements for both 10-year design storm and long duration storm events.

It is proposed that at least 3.9 MG of storage will be constructed as described in the more detailed technical discussion of the wastewater flows and storage requirements presented in Appendix A. The sizing of this facility will be verified prior to final design and adjusted as needed to address the potential risk of spill based on then current flow records and design criteria. The amount of storage could change based on various factors that could occur prior to the final sizing analysis. The County is responsible for all cost associated with the final storage analysis studies. SRCSD will review and approve the final storage analysis prior to it being accepted by the County.

Because the minimum storage volume of 3.6 MG has been established using SRCSD sizing/design criteria, the system operational criteria will allow for the County to resume discharging into the available capacity of the SRCSD facility if the 3.9 MG tank is full and the resumed discharge is needed to prevent an overflow of wastewater within the Sutter County sewer system as long as County discharge to the SRCSD system does not cause an SRCSD overflow.

Unless otherwise mutually agreed to by the Parties hereto, the proposed timing for installation and full operational capability of this storage facility shall be prior to the earliest occurrence of the following events (milestones):

(1) The construction of the future 24-inch diameter force main discussed in Section 10.

(2) The UNWI #3 reaching 50% of its ADWF capacity,

(3) The SPSP area reaching 50% build out (ESDs, ADWF, or PWWF), or

(4) Twenty years from the first date of connection to SRCSD system.

The ADWF is defined as the lowest consecutive three months of flow in a calendar year.

The storage facility is proposed to be funded from SPSP:

- Development Impact Fees
- Special Taxes
- Special Assessments
- Sewer Rates

The County intends to secure funding for the storage facility by inclusion of this obligation in both the Financing Plan for the SPSP and through a Development Agreement exaction from the developers of SPSP. County agrees to prohibit development within SPSP area in the absence of an approved Financing Plan and an executed and recorded Development Agreement.

10. Force Mains

The SPSP Force Mains are anticipated to consist of an initial installation of parallel 12-inch and 18-inch diameter force mains capable of serving approximately 30% build out of the SPSP area, and a future 24-inch diameter force main to serve the remaining build out of the SPSP area. Sutter County will obtain encroachment permits from Sacramento County for installation and maintenance of the SPSP Force Mains, as appropriate. The tentative alignments of the SPSP Force Mains and point of connection of the facilities to provide service to the SPSP area are shown in Figure 1.

The alignments and point of connection of the SPSP Force Mains will be coordinated between the SRCSD and the County. Any changes in the alignment and point of connection will be considered during the final storage analysis required by these Principles.

11. Date of Actual Connection

The "date of actual connection" will be defined as the date the County wastewater from the SPSP area is discharged into SRCSD conveyance facilities and begins to flow to the SRWTP. Currently, this date is estimated to be mid-late 2011.

12. Federal, State and Local Requirements

The County will obtain and comply with all necessary federal, state and local permits for the construction and continuing operation and maintenance of the County local collection system, Central Pump Station, Wastewater Storage Facility, and SPSP Force Mains described in these Principles (SPSP Facilities), and any other facilities up to and including the interconnection with the UNWI. With respect to permits (or coverage under general permits), unless otherwise requested by SRCSD, the parties will support that the County be the sole permittee for all such facilities.

The following state requirements are being highlighted in these Principles because of their importance. The California State Water Resources Control Board (SWRCB) adopted the Statewide General Waste Discharge Requirements (WDRs) for sanitary sewer systems on May 2, 2006; SRWCB Order No. 2006-0003, in an attempt to reduce the frequency and impact of sanitary sewer overflows (SSOs) on human health and the environment. The adopted WDRs require public agencies that own or operate sanitary sewer systems over one mile in length to meet many requirements including, but not limited to, the development and implementation of a Sewer System Management Plan (SSMP) and reporting of all SSOs into the SWRCB database.

It is the sole responsibility of the County to become familiar with and meet the requirements and other aspects of SRWCB Order No. 2006-0003 WDRs including, but not limited to, application requirements, monitoring requirements, reporting requirements, SSMP requirements, and other provisions and prohibitions contained within the WDRs with regards to legal operation of County facilities (SPSP Facilities) described within these Principles.

13. Compensation for Service

Compensation for sewer service to the SPSP area will be comprised of two components, (A) Sewer Impact Fees, and (B) Sewer Rates. Sutter County will be responsible for collection of all compensation for service similar to the provisions contained in the applicable sections of the Master Interagency Agreement, the Sewer Impact Fee Ordinance and the Sewer Rate Ordinance.

A. Sewer Impact Fee Ordinance

Compensation for sewage conveyance, treatment, and disposal facilities required to service the SPSP area will consist of the following items:

1) Sutter County shall pay to SRCSD an Impact Fee consistent with the latest adopted SRCSD Sewer Impact Fee Ordinance for each residential and commercial user in the SPSP area which discharges to the SRCSD system. All impact fees shall be collected by Sutter County. The County shall transfer these fees to SRCSD at quarterly intervals.
2) SRCSD will calculate and collect an Impact Fee consistent with the latest adopted SRCSD Sewer Impact Fee Ordinance for each industrial user in the SPSP area which discharges to the SRCSD system.
3) Sewer Impact Fees collected by Sutter County from property within the SPSP area prior to the date of connection to the SRCSD system shall be held by Sutter County until such time the designated area begins discharging to SRCSD facilities. At such time Sutter County will transfer said fees plus interest accrued to SRCSD.

B. Sewer Rate Ordinance

Compensation for operations and maintenance associated with providing service to Sutter County will consist of the following items:

1) Sutter County shall pay a monthly service charge consistent with the latest adopted SRCSD Sewer Rate Ordinance for each residential and commercial user in the SPSP area which discharges to the SRCSD system.

2) SRCSD shall calculate and collect a monthly service charge consistent with the latest adopted SRCSD Sewer Rate Ordinance for each industrial user and users permitted under the SRCSD pretreatment program which discharges to the SRCSD system.
3) All service charges related to SRCSD service that are billed to costumers in the SPSP area by Sutter County shall be paid to SRCSD monthly.

C. Equitable Rates

Sutter County will pay the same rates for service from SRCSD as comparable customers of SRCSD pay for service as outlined in the Sewer Impact Fee Ordinance and Sewer Rate Ordinance.

D. Proposition 218

To the extent allowed by law, Sutter County shall be responsible for compliance with Proposition 218 for any increase in sewer fees or charges.

E. Miscellaneous Costs

County agrees to absorb administrative costs incidental to collection and transmittal of regional service charges, costs attributable to uncollectible debts on service billings and costs attributable to unbilled SRCSD service charges that should reasonable have been billed. The County shall not bill SRCSD for such cost, nor deduct such costs from service charges due SRCSD.

F. Audit Authority

SRCSD shall have the authority to appoint such auditors as it deems necessary for the examination of financial records of the County to determine adequacy of cost accumulation and billing systems maintained by the County. The County shall make available to such auditors all requested records and will assist and cooperate with the auditors in their efforts.

14. SRCSD Sewer Use Ordinance and Industrial Pretreatment Program

After complying with any applicable environmental review requirements, the County will adopt and enforce ordinances, resolutions, rules and regulations consistent with and complementary to the SRCSD Sewer Use Ordinance for the SPSP area and comply with the applicable requirements. The County Ordinance will incorporate by reference provisions contained in the SRCSD Sewer Use Ordinance and any amendments thereafter. The ordinance is used to regulate discharges into sewers that would be detrimental to the SRCSD system. In the event of a conflict between the County Ordinance and SRCSD Ordinance, the latter shall prevail. The County will comply with the applicable statutes, rules and regulations of the SRCSD and agencies of the United States of America, and of the State of California.

The County ordinance will delegate authority to personnel of SRCSD to administer and enforce the SRCSD pretreatment program within the SPSP area.

Users located in the designated area will be subject to the same pre-treatment regulations as would be applied in any other SRCSD jurisdiction.

15. SRCSD Wastewater Recycling Program

The County will cooperate in the SRCSD Wastewater Recycling Program and, after complying with any applicable environmental review requirements, will establish an ordinance for the use of "purple pipe" for conveyance of recycled water within the SPSP area, as appropriate.

16. Cooperation in the Event of Third Party Legal Challenge

A. Third Party Challenge

If any legal action or proceeding is instituted challenging the validity of any provision of these Principles, the WWSA (if approved), the SOIA application (if approved), other agreements related to providing service to the SPSP, or the SRCSD's adoption or approval of these agreements, the parties shall cooperate, in a timely manner, in defending against such challenge to the maximum extent practicable consistent with their respective obligations and interests. Each party may use legal counsel of its choice. Costs (including legal fees) shall be apportioned consistent with Section 7 and 22 of these Principles.

B. Reconsideration

If any litigation results in a judgment wherein a court or courts order the SRCSD to reconsider any matter pertaining to these Principles, the WWSA, or other relevant agreements, the SRCSD and County agree that such reconsideration shall be expeditiously performed in a manner consistent with the requirements of the judgment.

17. Dispute Resolution

In addition to the various avenues of appeal available to all customers of SRCSD, the County and the SPSP customers shall be provided a mechanism to air grievances and resolve disputes with SRCSD and to bring matters to the attention of the SRCSD Board of Directors. The WWSA will provide the structure of appropriate grievance and dispute resolution process, which shall include dispute resolution between the County and SRCSD pertaining to the terms of the WWSA.

18. Term of these Principles

It is understood that these Principles are intended to express SRCSD's good faith intent to provide wastewater conveyance, treatment and disposal service to the SPSP area, but they are not intended to constitute a legally binding commitment to provide such service nor are they intended to provide all the detail that must be included in a binding agreement to provide service. The Parties agree that the commitments expressed herein shall be subject to the execution of a mutually acceptable, definitive WWSA, to be negotiated and subject to the approval of the SRCSD Board of Directors and the County, and contingent on completion of CEQA review, which shall consider, among other things, the option of not going forward with the tentative commitments described herein. Based on this understanding, these Principles shall become effective as of the date first set forth herein and shall continue until such time as a WWSA is approved by the County and SRCSD.

19. Wastewater Services Agreement

It is understood that a WWSA will be developed subsequent to the execution of these Principles and contingent on completion of CEQA review. The WWSA will address the definitive business aspects of SRCSD providing wastewater service to the County under a contract for service. It is envisioned that the WWSA shall run in perpetuity. The WWSA must be approved by the parties in order for the SRCSD to provide wastewater service. The WWSA shall be jointly reviewed by SRCSD and the County approximately every five years. The WWSA may be amended if jointly agreed to by both parties to the WWSA.

If the SPSP area is annexed into SRCSD, the WWSA will remain in effect until such time that the County, or a successor public entity, becomes a signatory to the Master Interagency Agreement. At that point the WWSA shall be terminated.

20. Operating Agreement

It is understood that an Operating Agreement (OA) will be developed subsequent to the execution of the WWSA and prior to commencing service. The OA will address:

- Inter-agency cooperation and technical details associated with operation of the system (e.g., emergency response, mutual aid, notification, etc.).
- Operating parameters (e.g., the specifics of the when and under what conditions the County will be allowed to discharge to the SRCSD system and how the parties will operate their respective systems to minimize the risk of sewer system overflows).
- Other issues including, but not limited to the following: construction specifications, inflow/infiltration, metering, industrial pretreatment, etc.

21. SRCSD Master Interagency Agreement

The Purpose of the SRCSD Master Interagency Agreement (MIA) is to establish the terms by which the SRCSD and Contributing Agencies own, operate, and maintain their sewer facilities. For the purposes of these Principles, Contributing Agencies are defined (per the MIA) as any public entity other than Sacramento County that is party to the MIA and contributes wastewater from its system to the SRCSD system. The MIA establishes the way costs are covered by SRCSD and the Contributing Agencies and also describes the rules and regulations concerning use of sewers.

A key requirement of the extension of SRCSD sewer service to SPSP is that it be consistent with SRCSD's MIA, specifically that the SRCSD will not enter into agreements to provide sewer service with Contracting Agencies (County, in this case) if it will materially affect the SRCSD Contributing Agencies from making reasonable use of SRCSD facilities or reasonably anticipated future uses.

Additionally, it is the intention of the parties that the County may eventually become a signatory to the MIA. In the meantime, however, the County or its successor entity shall operate its facilities consistent with the provisions of the SRCSD MIA.

22. Indemnification

Consistent with Section 16 of these Principles, the County hereby agrees to defend, indemnify and hold harmless and release SRCSD, its governing body, officers, agents, and employees from any and all loss, damage or liability, including, but not limited to, all reasonable legal fees, expert witness or consultant fees and expenses related to the response to, settlement of, or defense of any claims liability, or fines which may be suffered or incurred by SRCSD from any claim, action or proceeding brought against SRCSD that is related to its approval of these Principles or its subsequent approval of a Wastewater Services Agreement and that involves any of the following:

a. Any claims, demands and causes of action related to SRCSD's approval of these Principles or its subsequent approval of a Wastewater Services Agreement arising under the following: the California Environmental Quality Act (Public Resource Code, § 21000 et seq.), the California Hazardous Waste Control Law (Health and Safety Code, § 25100 et seq.), the Porter – Cologne Water Quality Control Act (Water Code, § 13000 et seq.), or any similar federal, state or local laws, as amended or enacted from time to time.

b. Any other alleged violation of environmental laws (federal, state or local statute, law, rule, regulation, ordinance, code, policy, rule of common law, judicial order, administrative order, consent decree, or judgment now or hereafter in effect) related to SRCSD's approval of these Principles or its subsequent approval of a Wastewater Services Agreement brought by a third party or a governmental entity (including but not limited to a governmental department, commission, board, bureau, agency,

court or other instrumentality of the United States or any jurisdiction, municipality or other political subdivision thereof).

c. And any other alleged action relating to environmental damage or environmental liability related to SRCSD's approval of these Principles or its subsequent approval of a Wastewater Services Agreement and based in whole or in part on negligence, negligence per se, gross negligence, or strict liability or on any other theory of liability whether in law (whether common, civil or statutory) or equity.

d. Any claim, action or proceeding brought against SRCSD, for the purpose of attacking, setting aside, voiding or annulling the approval by Sacramento LAFCo of the SRCSD's application to amend its Sphere of Influence to include the SPSP area.

With respect to any other claim, cause of action or proceeding each party agrees to protect, save harmless, indemnify, and defend the other, its governing body, officers, agents, and employees from any and all loss, damage or liability, including, but not limited to, all reasonable legal fees, expert witness or consultant fees and expenses related to the response to, settlement of, or defense of any claims liability, or fines which may be suffered or incurred by a party hereto, its governing body, officers, agents and employees, caused by, arising out of, or in any way connected with the respective responsibilities and duties hereby undertaken, except that each party shall bear the proportionate cost of any damage attributable to the fault of that party, its governing body, officers, agents, and employees. It is the intention of the parties that, where fault is determined to have been contributory by a court of law, principles of comparative fault under California law will be followed.

23. Insurance

Each Party, at its sole cost and expense, shall carry insurance or self-insure its activities in connection with these Principles, and obtain, keep in force and maintain, insurance or equivalent programs of self-insurance, for general liability, environmental liability, workers compensation, property, professional liability, business automobile liability, and automobile physical damage adequate to cover its potential liabilities hereunder. Each party agrees to provide the other thirty (30) days advance written notice of any cancellation, termination or lapse of any of the insurance or self-insurance coverages.

24. County's Successor in Interest

It is understood by the Parties hereto if the SPSP area becomes an incorporated city, then the County may assign its duties and obligations under these Principles, the WWSA and any subsequent agreements to the successor city or other public service provider, with SRCSD consent.

25. Failure of Regional System to Properly Treat Wastewater

This Section 25 is not intended to limit the indemnification provisions of Section 22. It is understood and agreed that SRCSD, in agreeing to work with Sutter County with the tentative intention to eventually allow the future wastewater of the SPSP area to be discharged to the SRCSD System and to have such wastewater conveyed, treated, and disposed of in said system, is not warranting or guaranteeing that the SRCSD will be able to satisfactorily treat such wastewater. In the event the SRCSD System should for any reason be incapable of satisfactorily conveying, treating, or disposing of wastewater discharged into the same by the County and by all other parties now or hereafter authorized to discharge wastewater therein, SRCSD shall in no way be liable to the County for any damages arising or resulting from or suffered because of the failure or alleged failure of the SRCSD System to satisfactorily receive, hold, treat or otherwise dispose of wastewater, provided, however, that SRCSD shall not knowingly permit to be discharged into the SRCSD System any wastewater at rates of flow, strength or other characteristics inconsistent with those for which the SRCSD System is designed to handle or has been shown capable of handling by prior experience.

SRCSD and County have agreed to use these Principles for guidance in the negotiation of a WWSA.

IN WITNESS WHEREOF, the parties hereto have caused this Agreement to be duly executed as of the day and year first written above.

SACRAMENTO REGIONAL COUNTY SANITATION DISTRICT, a county sanitation district pursuant to and operating under the authority of the County Sanitation District Act, commencing at Health and Safety Code section 4700

By: Mary K. Snyder
Mary K. Snyder, District Engineer

Date: 6-15-09

COUNTY OF SUTTER, a political subdivision of the State of California

By: Jim Whitaker
(printed name)

Chairman
(title)

Date: 6-9-09

Agreement Approved by the Board of Directors with Authority Delegated to the District Engineer to execute the Agreement on behalf of District.

Agenda Date: 6-10-09

Item Number: 3

Resolution No.: SR-2491

Approved
County Counsel
Sutter County, California
By Jennifer Bender, Deputy

CONTRACT AND CONTRACTOR TAX STATUS REVIEWED AND APPROVED BY COUNTY COUNSEL

SEE ATTACHED COUNTERPART(S)

By: _____ Date: _____
Lisa Travis
Supervising Deputy County Counsel

SRCSD and County have agreed to use these Principles for guidance in the negotiation of a WWSA.

IN WITNESS WHEREOF, the parties hereto have caused this Agreement to be duly executed as of the day and year first written above.

SACRAMENTO REGIONAL COUNTY SANITATION DISTRICT, a county sanitation district pursuant to and operating under the authority of the County Sanitation District Act, commencing at Health and Safety Code section 4700

SEE ATTACHED COUNTERPART(S)

By: _____
Mary K. Snyder, District Engineer

Date: _____

COUNTY OF SUTTER, a political subdivision of the State of California

SEE ATTACHED COUNTERPART(S)

By: _____

_____
(printed name)

_____
(title)

Date: _____

Agreement Approved by the Board of Directors with Authority Delegated to the District Engineer to execute the Agreement on behalf of District.

Agenda Date: _____

Item Number: _____

Resolution No.: _____

CONTRACT AND CONTRACTOR TAX STATUS
REVIEWED AND APPROVED BY COUNTY COUNSEL

By: _____
Lisa Travis
Supervising Deputy County Counsel

Date: _____

BEFORE THE BOARD OF SUPERVISORS
COUNTY OF SUTTER, STATE OF CALIFORNIA

RESOLUTION OF THE BOARD OF SUPERVISORS AUTHORIZING THE EXECUTION OF THE PRICIPLES OF AGREEMENT WITH SACRAMENTO REGIONAL COUNTY SANITATION DISTRICT	)))))	RESOLUTION NO. 09-045

WHEREAS, it is environmentally sound and cost effective to support a regional approach to wastewater treatment and disposal for the Sutter Pointe Specific Plan area located in south Sutter County, and

WHEREAS, Sutter County staff previously submitted a "Consideration for Service" request to the Sacramento Regional County Sanitation District (SRCSD), and

WHEREAS, a Principles of Agreement (POA) document containing the key understandings and requirements regarding the extension of SRCSD conveyance and treatment services to south Sutter County has been developed, and

WHEREAS, the POA identifies principles that will be incorporated into subsequent contracts and agreements between Sutter County and Sacramento Regional Sanitation District.

NOW, THEREFORE, BE IT RESOLVED that the Board of Supervisors approves the Principles of Agreement and authorizes the Chairman to sign such agreement on behalf of the County of Sutter.

PASSED AND ADOPTED BY THE Board of Supervisors of the County of Sutter, State of California, this 9th day of June, 2009, by the following vote:

AYES: Supervisors Montna, Cleveland, Munger, Whiteaker, and Gallagher

NOES: None

ABSENT None

CHAIRMAN, BOARD OF SUPERVIOSRS

ATTEST:

DONNA JOHNSTON
COUNTY CLERK

DEPUTY

BOARD OF SUPERVISORS
SUTTER CO., CA

The Foregoing Instrument is a Correct Copy of the Original on File in this Office:

JUN 10 2009

DONNA M. JOHNSTON, County Clerk and ex-officio Clerk of the Board of Supervisors of the State of California in and for the County of Sutter
By _____ Deputy

SACRAMENTO REGIONAL COUNTY SANITATION DISTRICT

RESOLUTION NO. SR-2491

AGREEMENT FOR
PRINCIPLES OF AGREEMENT BETWEEN SACRAMENTO REGIONAL COUNTY SANITATION DISTRICT AND SUTTER COUNTY TO PROVIDE SEWER SERVICE TO SUTTER POINTE SPECIFIC PLAN AREA
(CONTRACT NO. 70403)

BE IT RESOLVED AND ORDERED that the Board of Directors of the SACRAMENTO REGIONAL COUNTY SANITATION DISTRICT, a county sanitation district pursuant to and operating under the authority of the County Sanitation District Act, commencing at Health and Safety Code section 4700, hereby approves the Principles of Agreement (POA), in the form hereto attached, and authorizes the District Engineer to execute on behalf of the District the POA with the COUNTY OF SUTTER, a political subdivision of the State of California, to provide for the potential extension of sewer service to the Sutter Pointe Specific Plan (SPSP) area.

ON A MOTION by Director Howell, and seconded by Director Bruins, the foregoing resolution was passed and adopted by the Board of Directors of the Sacramento Regional County Sanitation District, State of California, this 10th day of June, 2009, by the following vote, to wit:

AYES: Directors, MacGlashan, Nottoli, Peters, Bruins, Howell, Skoglund, Sheedy, Villegas, McGowan, Scherman

NOES: Directors, none

ABSENT: Directors, Dickinson, Yee, Fong, Pannell, Cohn, Hammond

ABSTAIN: Directors, none

Chair of the Board of Directors
Sacramento Regional County Sanitation District, a county sanitation district pursuant to and operating under the authority of the County Sanitation District Act, commencing at Health and Safety Code section 4700

(SEAL)

ATTEST: Sandra Burnett
Clerk of the Board of Supervisors of Sacramento County, California, and ex-officio Secretary of the Board of Directors of the Sacramento Regional County Sanitation District

In accordance with Section 25103 of the Government Code of the State of California a copy of the document has been delivered to the Chairman on June 10, 2009

By: Gwenyne Dowlen
Deputy Clerk, Board of Directors

FILED
BOARD OF DIRECTORS
JUN 10 2009
By Sandra Burnett
Clerk of the Board

Figure 1

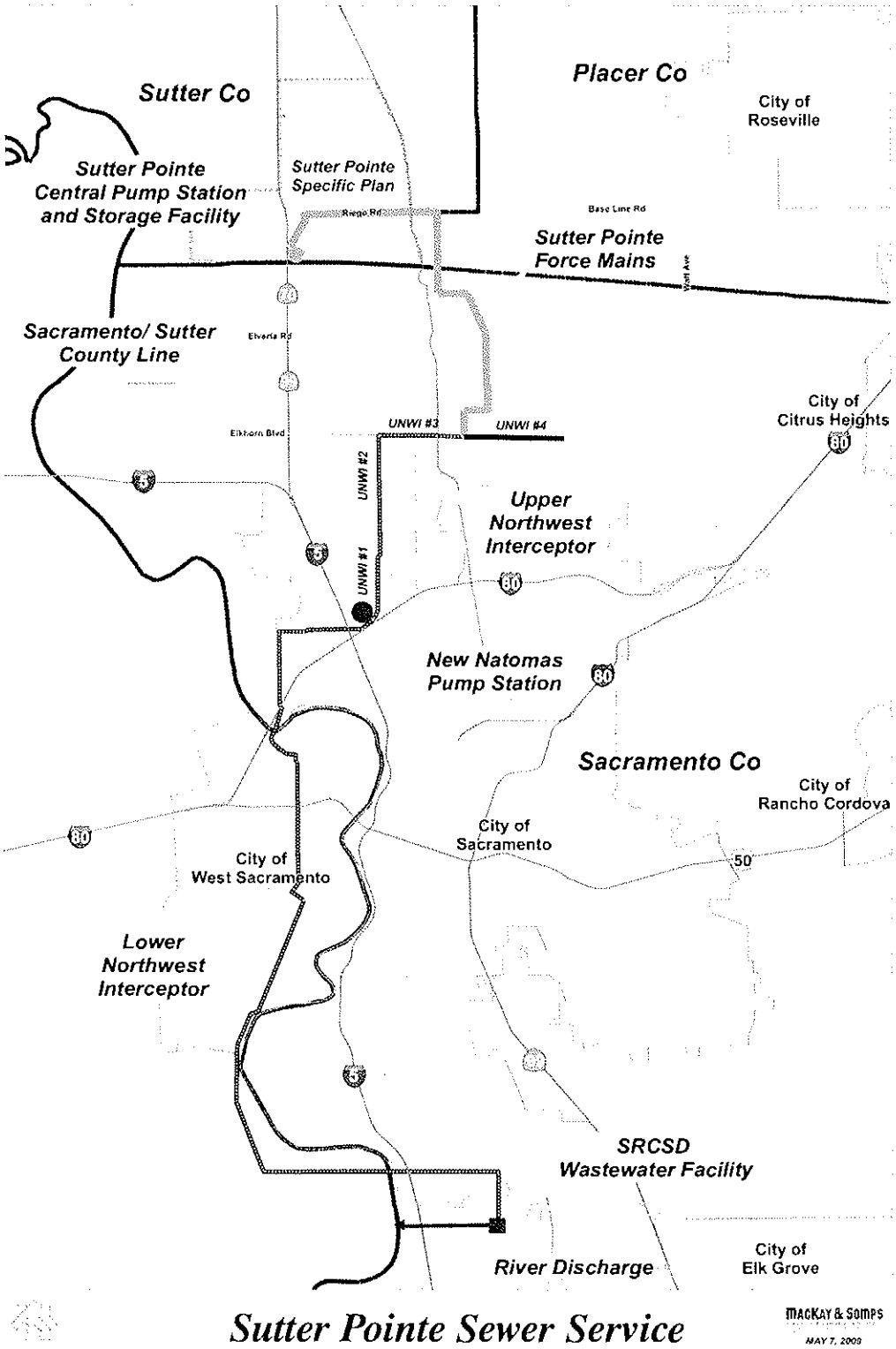
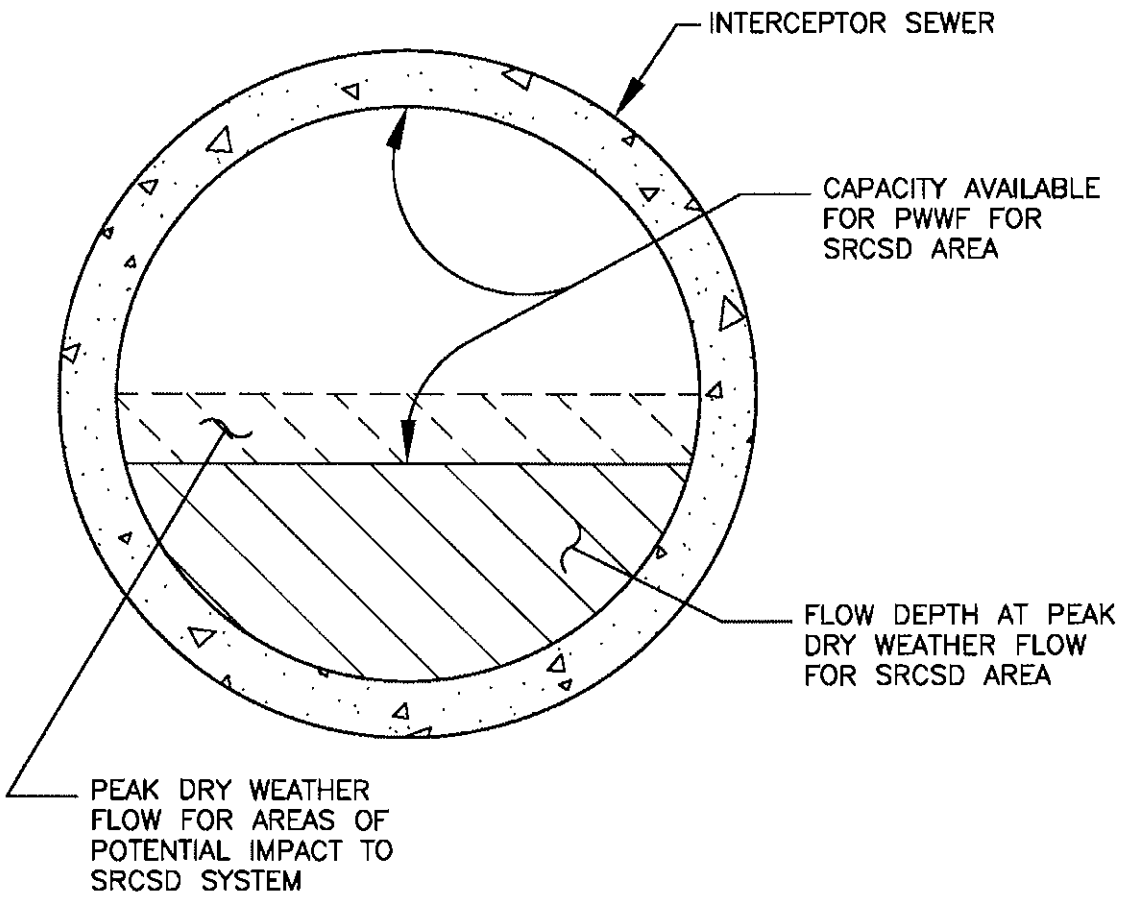

Sutter Co
Placer Co
City of Roseville
Sutter Pointe Central Pump Station and Storage Facility
Sutter Pointe Specific Plan
Base Line Rd
Sutter Pointe Force Mains
Sacramento/ Sutter County Line
Elverta Rd
Elkhorn Blvd
UNWI #3
UNWI #4
UNWI #2
UNWI #1
City of Citrus Heights
Upper Northwest Interceptor
New Natomas Pump Station
Sacramento Co
City of Rancho Cordova
City of Sacramento
City of West Sacramento
50
Lower Northwest Interceptor
SRCSD Wastewater Facility
River Discharge
City of Elk Grove
Sutter Pointe Sewer Service
MacKay & Somps
MAY 7, 2009

Figure 2

Capacity Option To Serve Areas Outside The Urban Services Boundary



NOTE: AREAS OF POTENTIAL IMPACT TO SRCSD CONVEYANCE SYSTEM WOULD BE REQUIRED TO PROVIDE STORAGE DURING STORM EVENTS.

Appendices:

Appendix A

Technical Discussion of SPSP Wastewater Flows and Storage Requirements
(April 2009, Prepared by MSCE)

Appendix B

SRCSD Wastewater Conveyance Modeling and Storage Analysis for Measure M Properties (Sutter Pointe Specific Plan)
Sutter Pointe Specific Plan Sewer Storage Analysis Study Report
(March 17, 2008, Prepared for Measure M Properties by MWH)

Appendix C

Supplemental Analysis
Storage Volume Impacts When Changing SPSP PWWF to 27 mgd
(April 22, 2008, Prepared for Measure M Properties by MWH)

Appendix B
Environmental Checklist

ESA

APPENDIX B
Environmental Checklist

Introduction

This Environmental Checklist is based on the checklist included in Appendix G of the CEQA Guidelines. Each environmental issue includes a discussion of the following: background (where in 2009 SPSP EIR the environmental issue is discussed; summary of existing conditions; applicable 2009 SPSP EIR standards of significance; applicable 2009 SPSP EIR impacts and mitigation measures; and discussion of environmental checklist items, including findings for potential project effects. The Environmental Checklist identifies potential project effects as corresponding to the following categories of environmental impacts:

- **Potentially Significant Impact**: An affect that was not adequately address in the 2009 SPSP EIR and may be significant based on substantial evidence and the significance criteria. This impact is will be further evaluated in the Focused Tiered EIR.

- **Less than Significant Impact**: An effect for which no significant impacts, only less-than-significant impacts, result.

- **No Impact**: The project does not create an impact.

- **Impact Adequately Addressed in 2009 SPSP EIR**: An effect that was adequately addressed and mitigated to the extent feasible in the 2009 SPSP EIR. For these effects an explanation is provided as to how the effect was addressed in the 2009 SPSP EIR and why the criteria for supplemental environmental review under CEQA Section 21166 (project changes, changed circumstances, and/or new information) have not been triggered. Effects correspond to this category under the following circumstances:

    - The 2009 SPSP EIR found that the impact would be reduced to a less-than-significant level with the implementation of applicable 2009 SPSP EIR mitigation measures. Mitigation measures from the 2009 SPSP EIR were adopted for development in the SPSP Area by the Sutter County Board of Supervisors and they would mitigate identified impacts associated with implementation of the proposed project. These mitigation measures would be implemented, enforced and monitored as defined in the Mitigation Monitoring and Reporting Program (MMRP) for the 2009 SPSP EIR. Sutter County would ensure that construction and operation of the proposed project would be implemented consistent with the mitigation, monitoring and enforcement requirements of the 2009 SPSP EIR MMRP.

    - The impact is significant and unavoidable at a project level, but the 2009 SPSP EIR contained an adequate project-level analysis for the impact.

Summary of Environmental Factors Potentially Affected

As identified in this Environmental Checklist, it has been determined that the proposed project would not result in any potentially significant impacts that are not sufficiently addressed and mitigated by the 2009 SPSP EIR with the exception of the following environmental issues checked below:

☐ Aesthetics	☐ Agriculture and Forest Resources	☒ Air Quality
☒ Biological Resources	☒ Cultural Resources	☐ Geology, Soils and Seismicity
☒ Greenhouse Gas Emissions	☐ Hazards and Hazardous Materials	☐ Hydrology and Water Quality
☐ Land Use and Land Use Planning	☐ Mineral Resources	☒ Noise
☐ Population and Housing	☐ Public Services	☐ Recreation
☐ Transportation and Traffic	☒ Utilities and Service Systems	

The analysis of these environmental issues is included in Chapter 3 of this Focused Tiered EIR.

Aesthetics

Section 3.16 of the 2009 SPSP EIR addresses the aesthetics effects of build out of the SPSP. The following discussion summarizes information presented in Section 3.16, page 3.16-18 through 3.16-23 of the 2009 SPSP EIR.

Environmental Setting

The project site and surrounding areas (project area) are generally flat, low-lying alluvial plain that is primarily in agricultural use, with the majority being rice fields in the SPSP area, and rural or low-density housing within the Elverta community in Sacramento County. Other crops present in the vicinity of the SPSP area include wheat and other grain crops, safflower, and alfalfa, nonnative annual grassland, and irrigated grassland managed primarily for hay production. The project area also includes non-agricultural lands and facilities typically found in agricultural settings, such as equipment storage facilities, sheds, single-family dwellings, and irrigation canals and equipment, as well as a number of industrial/commercial facilities.

The SPSP area is most visible from State Route (SR) 99/70, which provides the most common viewing corridor. The SPSP area is also visible from public roadways that border and cross the project area, including Powerline Road, Riego Road, Pacific Avenue, Sankey Road, and Natomas Road. Additionally, the proposed project alignments within road rights-of-way are viewable from neighboring residences and drivers on the roadways. Although the proposed project site is visible from agricultural lands, isolated farmsteads or rural residences, low-density residential, and commercial buildings, these views are seen exclusively from limited numbers of properties.

Views to motorists traveling on SR 99/70, Powerline Road, Riego Road, Pacific Avenue, Sankey Road, Natomas Road, and other nearby roadways and to residents adjacent to the project site include the city of Sacramento skyline to the south, the Sutter Buttes to the north, the Sacramento River to the west, and the Sierra Nevada range to the east. Currently, views of the Sutter Buttes, Sierra Nevada, Coast Ranges, and the city of Sacramento skyline are visible only on a clear day. Views of the Sacramento River from these roadways and the project site are marked by riparian woodlands that include mature trees and shrubs along the banks of the river; the river itself is not visible. In addition, because of the distance between the project

site and the surrounding mountain ranges, the city of Sacramento skyline, and the Sacramento River, these features are not a prominent component of background views for motorists and existing residents in this area and would not qualify as a scenic vista.

2009 SPSP EIR Standards of Significance

The 2009 SPSP EIR considered an aesthetic impact significant if build out of the SPSP would:

- Have a substantial adverse effect on a scenic vista;
- Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway;
- Substantially degrade the existing visual character or quality of the site and its surroundings; or
- Create a new source of substantial light or glare that would adversely affect day or nighttime views in the area.

2009 SPSP EIR Impacts and Mitigation Measures

Impacts of the build out of the SPSP on aesthetic resources were evaluated in Section 3.16 of the 2009 SPSP EIR. Aesthetic resource impacts identified in the 2009 SPSP EIR that are relevant to the proposed project are presented below with their corresponding levels of significance before and after application of mitigation measures identified in the 2009 SPSP EIR.

2009 SPSP EIR IMPACTS

Aesthetics		Level of Significance Prior to Mitigation	Level of Significance After Mitigation
3.16-1	**Alteration of a Scenic Vista**. Implementation of the proposed project would not result in the degradation of the visual quality of a scenic vista.	LS	NA
3.16-2	**Damage to Scenic Resources within a State Scenic Highway**. Implementation of the proposed project would not damage scenic resources and is not visible from a state-designed scenic highway.	LS	NA
3.16-3	**Degradation of Visual Character.** Project implementation would substantially alter the visual character of the project site through conversion of agricultural land to developed urban uses.	S	SU
3.16-4	**Temporary Degradation of Visual Character for Developed Project Land Uses during Construction.** The presence and movement of heavy construction equipment and staging areas could temporarily degrade the existing visual character and/or quality of the project site and surrounding area.	S	SU
3.16-5	**New Light and Glare.** Project implementation would require lighting of new development, which could inadvertently cause increased light and glare.	S	LS
3.16-6	**New Skyglow Effects.** The proposed project would require lighting of new development that would result in increased skyglow effects, effectively obscuring views of stars, constellations, and other features of the night sky.	S	SU

LS=Less than Significant, S=Significant, PS=Potentially Significant, SU=Significant and Unavoidable, NA = Not Applicable

The following mitigation measures from the 2009 SPSP EIR were adopted for development in the SPSP area by the Sutter County Board of Supervisors and they would mitigate aesthetic impacts associated with

implementation of the proposed project. Sutter County would ensure that construction and operation of the proposed project would be implemented consistent with the mitigation, monitoring and enforcement requirements for the 2009 SPSP EIR MMRP.

2009 SPSP EIR MITIGATION MEASURES

Aesthetics	
3.16-4	Screen Construction Staging Areas.
3.16-5	Establish and Require Conformance to Lighting Standards and Prepare and Implement a Lighting Plan.

Environmental Checklist and Discussion

The following section addresses the effects of the proposed project on aesthetics.

Issues (and Supporting Information Sources):		*Potentially Significant Impact*	*Less Than Significant Impact*	*No Impact*	*Impact Adequately Addressed in 2009 SPSP EIR*
1.	**AESTHETICS—Would the project:**				
a)	Have a substantial adverse effect on a scenic vista?	☐	☐	☒	☐
b)	Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway corridor?	☐	☐	☒	☐
c)	Substantially degrade the existing visual character or quality of the site and its surroundings?	☐	☒	☐	☐
d)	Create a new source of substantial light or glare which would adversely affect daytime or nighttime views in the area?	☐	☒	☐	☐

Discussion

a) **No Impact.** The proposed project would include construction of underground pump stations and pipelines as described in the project description. Construction of the proposed project would be temporary and construction equipment and vehicles would not obscure scenic views from properties adjacent to project construction. Further, because the project facilities would be underground, there would be no permanent obstruction of views from motorists along roadways or from properties adjacent to the project site. Therefore, no impact would occur, and this issue will not be evaluated in the Focused Tiered EIR.

b) **No Impact.** A review of the current Caltrans Map of Designated State Scenic Highways indicated that there are no officially designated state scenic highways in the vicinity of the proposed project area (Caltrans, 2015). No impact would occur and this issue will not be evaluated in the Focused Tiered EIR.

c) **Less-than-Significant Impact.** The proposed project would include construction of pump stations and force mains in a rural and suburban area. The proposed pipelines would be buried following completion of construction and would therefore, not be visible. Construction activities would require the use of heavy equipment and temporary storage of materials at construction sites. Excavated areas, stockpiled soils, and other materials within the construction and staging areas would contribute short-term changes in the visual landscape within the immediate vicinity of the construction sites. Following completion of installation, disturbed areas would be restored to pre-

existing conditions. The areas disturbed during construction of the pump stations would not significantly degrade the existing visual character of the site because it is approved for development and industrial use, and would be converting a comparatively small amount of land in a large agricultural area within private property not within viewing distance from existing public roads or land. Therefore, the proposed project would have a temporary and less-than-significant impact on visual resources. Further, with the implementation of 2009 SPSP EIR Mitigation Measure: 3.16-4, construction staging areas would screened from view. Impacts would be less than significant and this issue will not be evaluated further in the Focused Tiered EIR.

d) **Less-than-Significant Impact.** Construction of the proposed project would result in temporary lighting during construction activities for both the pump stations and the pipelines. Operation and maintenance of the proposed project would not require installation of permanent lighting sources. Because lighting would be used only during emergency operations and maintenance, there would be no permanent sources of light or glare, and impacts would be less-than-significant. This issue will not be evaluated further in the Focused Tiered EIR.

Summary

Because the project site would not impact a scenic resource or is within a state scenic highway, the project would have no impact no these resources. 2009 SPSP EIR Mitigation Measure 3.16-4 would be implemented as part of the proposed project and would further reduce impacts relating to the temporary degradation of the visual character of the project area at construction staging areas; therefore, aesthetic impact will not be evaluated further in the Focused Tiered EIR.

References

California Department of Transportation (Caltrans), 2015. California Scenic Highway Program. Available: http://www.dot.ca.gov/hq/LandArch/16_livability/scenic_highways/index.htm. Accessed November 4, 2015.

Agricultural and Forest Resources

Section 3.11 of the 2009 SPSP EIR addresses the effects to agricultural resources under build out of the SPSP. The following discussion summarizes information presented in Section 3.11, page 3.11-5 through 3.11-9 of the 2009 SPSP EIR.

Environmental Setting

Prior to the adoption of the SPSP, the proposed project site was within the 9,500-acre "Sutter County Industrial-Commercial Reserve" designated in the 1996 Sutter County General Plan to accommodate employment-related uses. Most of the undeveloped land in the SPSP area and vicinity in Sutter County was zoned General Agricultural (AG) with 80-acre minimum lot sizes. Upon adoption of the SPSP in 2009, the SPSP area was rezoned with a new Specific Plan (SP) zoning district and removed all agricultural zoning. The project pipeline alignment outside of the SPSP area within Sacramento County is located in areas designated for road and utility rights of way in areas designated for agricultural, industrial, and residential land use.

The Sutter County Important Farmland Map, published by California Department of Conservation's (CDC) Division of Land Resource Protection, designates the SPSP area and some areas along Riego Road as

Important Farmland (CDC 2014). The SPSP area currently includes 1,899 acres of Prime Farmland, 5,036 acres of farmland of statewide importance, 332 acres of grazing land, and 113 acres of other land. The SPSP area contains a total of approximately 6,935 acres of Important Farmland, which accounts for approximately 2.4 percent (%) of Important Farmland in Sutter County, of which the proposed project is a fraction. None of the land within the SPSP area is held under Williamson Act contract. In addition, there are no forest resources on the project site. The rest of the proposed project outside of the SPSP area in Sacramento County is within road rights-of-way, easements, or land adjacent to roadways, some of which are designated for agricultural land use that is not designated as important farmland.

2009 SPSP EIR Standards of Significance

The 2009 SPSP EIR considers an impact to agricultural resources significant if build out of the SPSP would:

- Convert Important Farmland (i.e., Prime Farmland, Unique Farmland, or Farmland of Statewide Importance) as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to nonagricultural use;
- Conflict with existing zoning for agricultural use or a Williamson Act contract; and
- Involve other changes in the existing environment which, due to their location or nature, could result in conversion of Important Farmland to nonagricultural use.

2009 SPSP EIR Impacts and Mitigation Measures

Impacts of the build out of the SPSP on agricultural and forest resources are evaluated in Section 3.11 of the 2009 SPSP EIR. Agricultural and forest resource impacts identified in the 2009 SPSP EIR that are relevant to the proposed project are presented below with their corresponding levels of significance before and after application of mitigation measures identified in the 2009 SPSP EIR.

2009 SPSP EIR IMPACTS

Agricultural Resources		Level of Significance Prior to Mitigation	Level of Significance After Mitigation
3.11-1	**Permanent Conversion of Important Farmland to Nonagricultural Urban Uses**. Implementation of the proposed project would result in the permanent conversion of Important Farmland to nonagricultural uses.	S	SU
3.11-2	**Cancellation of Williamson Contracts**. Implementation of the proposed project would not result in the cancellation of Williamson Act contracts, because none of the lands are currently under Williamson Act.	LS	NA
3.11-3	**Conflict with Existing On-Site and Off-Site Agricultural Operations**. Implementation of the proposed project would locate urban land uses adjacent to existing agricultural lands, which could impair adjacent agricultural activities, result in land use compatibility conflicts, and potentially result in the ultimate conversion of this land to nonagricultural land uses.	S	SU
3.11-4	**Potential Temporary, Short--Term Disruption of Existing Agricultural Operations during Construction**. Implementation of the proposed project could potentially affect existing agricultural operations and result in a temporary, short- or long-term loss in agricultural productivity.	PS	LS

LS=Less than Significant, S=Significant, PS=Potentially Significant, SU=Significant and Unavoidable, NA = Not Applicable

No Mitigation Measures from the 2009 SPSP EIR are relevant to the proposed project for agricultural resources.

Environmental Checklist and Discussion

Issues (and Supporting Information Sources):	*Potentially Significant Impact*	*Less Than Significant Impact*	*No Impact*	*Impact Adequately Addressed in 2009 SPSP EIR*
2. AGRICULTURAL AND FOREST RESOURCES In determining whether impacts to agricultural resources are significant environmental effects, lead agencies may refer to the California Agricultural Land Evaluation and Site Assessment Model (1997) prepared by the California Department of Conservation as an optional model to use in assessing impacts on agriculture and farmland. In determining whether impacts to forest resources, including timberland, are significant environmental effects, lead agencies may refer to information compiled by the California Department of Forestry and Fire Protection regarding the state's inventory of forest land, including the Forest and Range Assessment Project and the Forest Legacy Assessment Project; and forest carbon measurement methodology provided in Forest Protocols adopted by the California Air Resources Board. **Would the project:**				
a) Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance, as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use?	☐	☐	☒	☐
b) Conflict with existing zoning for agricultural use, or a Williamson Act contract?	☐	☐	☒	☐
c) Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code section 12220(g)), timberland (as defined by Public Resources Code section 4526), or timberland zoned Timberland Production (as defined by Government Code section 51104(g))?	☐	☐	☒	☐
d) Result in the loss of forest land or conversion of forest land to non-forest use?	☐	☐	☒	☐
e) Involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland of Statewide Importance to non-agricultural use or conversion of forest land to non-forest use?	☐	☐	☐	☒

Discussion

a) **No Impact.** Although the majority of the SPSP area is considered Prime or Farmland of Statewide Importance, the proposed project facilities would be constructed subsequent to development agreements and implementation of initial roadway grading and construction activities for development of the Phase I areas within the SPSP area. Further, the pipeline alignment outside of the SPSP area is located within roadway and utility rights of way Therefore, the proposed project would not convert important farmland and would have no impact. This issue will not be evaluated in the Focused Tiered EIR.

b) **No Impact.** Per the adopted SPSP Land Use and Development Code, the project area is not zoned for agricultural use nor is any part of the project area under Williamson Act Contract (Sutter County, 2009). As a result, implementation of the proposed project would not conflict with existing zoning for agricultural use, or a Williamson Act contract. Further, the pipeline alignment outside of the SPSP area is located within roadway and utility rights of way. No impact would occur and this issue will not be evaluated in the Focused Tiered EIR.

c,d) **No Impact.** Per the adopted SPSP Land Use and Development Code, the project area is not zoned as forest land and would therefore not result in the loss of forest land or conversion of forest land

to non-forest use. No impact would occur and this issue will not be evaluated in the Focused Tiered EIR.

e) **Adequately Addressed in 2009 SPSP EIR.** The proposed project would be a subsequent step in the approved conversion of the project area from farmland to non-agricultural use. This development is consistent with the Sutter County General Plan, Sutter County Measure M objectives, and the adopted SPSP and EIR. Implementation of the proposed project would not contribute to the conversion of farmland above and beyond the levels already evaluated in the 2009 SPSP EIR, nor would it convert forest lands. This impact is considered to be adequately addressed in the 2009 SPSP EIR and will not be further evaluated in the Focused Tiered EIR.

Summary

Implementation of the proposed project would not conflict with zoning for agricultural or forest lands, conflict with existing Williamson Act contracts, or result in the conversion of farmland or forest lands to urban uses outside that already planned by the 2009 SPSP EIR.

References

California Department of Conservation, 2014. Sutter County Important Farmland 2012, August 2014.

Sutter County, 2008. Sutter Pointe Specific Plan Project EIR, December 2008.

Sutter County, 2009. Sutter Pointe Specific Plan Land Use and Development Code, June 2009.

Air Quality

Section 3.4 of the 2009 SPSP EIR addresses the air quality effects of growth under build out of the SPSP. The following discussion summarizes information presented in Section 3.4, page 3.4-16 through 3.4-23 of the 2009 SPSP EIR.

Environmental Setting

May through October is ozone season in the Sacramento Valley Air Basin (SVAB) and is characterized by poor air movement in the mornings and the arrival of the Delta sea breeze from the southwest in the afternoons. In addition, longer daylight hours provide a plentiful amount of sunlight to fuel photochemical reactions between Reactive Organic Gasses (ROG) and Nitrogen Oxides (NO_X), which in turn result in ozone formation. Typically, the Delta breeze transports air pollutants northward out of the SVAB; however, during approximately half of the time, from July through September, a phenomenon known as the Schultz Eddy prevents this from occurring. The Schultz Eddy phenomenon causes the wind pattern to shift southward, blowing air pollutants back into the SVAB. This phenomenon exacerbates the concentration of air.

Mobile sources are the largest contributor to the estimated annual average levels of ROG, carbon monoxide (CO), and NO_X in Sutter County, accounting for approximately 40%, 72%, and 72%, respectively, of the total emissions. Areawide sources account for approximately 83% and 64% of the county's PM_{10} and $PM_{2.5}$ emissions, respectively. Stationary and mobile sources account for approximately 43% and 31%, respectively, of the County's emissions of sulfur oxides (SOx) (ARB 2008).

2009 SPSP EIR Standards of Significance

The 2009 SPSP EIR considers an air quality impact significant if build out of the SPSP would:

- Conflict with or obstruct implementation of the applicable air quality plan,
- Violate any air quality standard or contribute substantially to an existing or projected air quality violation,
- Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is nonattainment under an applicable National Ambient Air Quality Standards (NAAQS) or California Ambient Air Quality Standards (CAAQS) (including releasing Emissions that exceed quantitative thresholds for ozone precursors),
- Expose sensitive receptors to substantial pollutant concentrations, or
- Create objectionable odors affecting a substantial number or people.

In accordance with the Feather River Air Quality Management District (FRAQMD)-recommended thresholds for evaluating project-related air quality impacts (including FRAQMD's Indirect Source Review Guidelines), implementation of the proposed project would be considered significant if operation of the proposed project would (FRAQMD 2010):

- Exceed the project size screening levels of FRAQMD's Indirect Source Review Guidelines (FRAQMD 2010) or, at a project level, emit (from all project sources, both stationary and mobile) greater than 25 lb/day for ROG or NO_X and 80 pounds per day (lb/day) for PM_{10};
- Contribute to localized concentrations of air pollutants at nearby receptors that would exceed applicable ambient air quality standards;
- Result in exposure of sensitive receptors to a substantial incremental increase in toxic air contaminants (TAC) emissions (e.g., stationary or mobile source) that exceed 10 chances per million for excess cancer risk and/or a hazard index of 1 for noncancer risk at the Maximally Exposed Individual (MEI). As incremental increase thresholds, it is FRAQMD's implied intention that these standards also serve as cumulative contribution thresholds; or
- Result in the frequent exposure of sensitive land uses to odorous emissions.
- No significance thresholds have been established by the FRAQMD for exposure of sensitive receptors to mobile source TAC emissions.

2009 SPSP EIR Impacts and Mitigation Measures

Impacts of the build out of the SPSP on air quality are evaluated in Section 3.4 of the 2009 SPSP EIR. Air quality impacts identified in the 2009 SPSP EIR that are relevant to the proposed project are presented below with their corresponding levels of significance before and after application of mitigation measures identified in the 2009 SPSP EIR.

2009 SPSP EIR IMPACTS

Air Quality		Level of Significance Prior to Mitigation	Level of Significance After Mitigation
3.4-1	**Generation of Temporary, Short-Term Construction Emissions of ROG, NO_X, and PM10**. Construction activities associated with development of the proposed project would generate temporary, short-term emissions of PM10, ROG, and NO_X. Because of the large size of the project, construction generated emissions of NO_X, an ozone precursor, would exceed air district-recommended thresholds and would substantially contribute to emissions concentrations that exceed the NAAQS or CAAQS.	S	SU
3.4-2	**Generation of Long-Term Operational (Regional) Emissions of ROG, NO_X, and PM10**. Operational area- and mobile-source emissions related to implementation of the proposed project would exceed the FRAQMD-recommended threshold of 25 lb/day for ROG and NO_X and 80 lb/day for PM10 and would result in or substantially contribute to emissions concentrations that exceed the NAAQS or CAAQS. In addition, because of the large increase in emissions associated with buildout of the proposed project and the fact that the proposed project is not within an already approved plan (which means that increased emissions would not already be accounted for in applicable air quality plans), project implementation could conflict with air quality planning efforts.	S	SU
3.4-3	**Generation of Local Mobile-Source CO Emissions**. Project-generated local mobile-source CO emissions would not result in or substantially contribute to concentrations that exceed the 1-hour ambient air quality standard of 20 ppm or the 8-hour standard of 9 ppm.	LS	NA
3.4-4	**Exposure of Sensitive Receptors to Short- and Long-Term Emissions of Toxic Air Contaminants**. Project implementation would result in exposure of sensitive receptors to short- and long-term emissions of TACs from on-site mobile and stationary sources.	S	SU
3.4-5	**Possible Exposure of Sensitive Receptors to Odorous Emissions**. Short-term construction and long-term operation of the proposed project could result in the frequent exposure of sensitive receptors to substantial objectionable odor emissions.	S	LS
3.4-6	**Generation of Temporary, Short-Term Construction-Related Emissions of Criteria Air Pollutants and Precursors**. Project-generated, construction-related emissions of ROG and NO_X would exceed the FRAQMD's significance threshold of 25 lb/day, and emissions of PM10 would exceed the FRAQMD's significance threshold of 80 lb/day. Thus, project-generated, construction-related emissions of criteria air pollutants and precursors could violate or contribute substantially to an existing or projected air quality violation, expose sensitive receptors to substantial pollutant concentrations, and/or conflict with air quality planning efforts.	S	SU
3.4-7	**Generation of Long-Term Operation-Related (Regional) Emissions of Criteria Air Pollutants and Precursors**. Operation-related activities associated with the land uses developed in Phase 1 and Phase A would result in mass emissions of ROG, NO_X, and PM10 that exceed the FRAQMD's significance thresholds of 25 lb/day, 25 lb/day, and 80 lb/day, respectively. Thus, project generated, operation-related emissions of criteria air pollutants and precursors could violate or contribute substantially to an existing or projected air quality violation and/or expose sensitive receptors to substantial pollutant concentrations, especially considering the nonattainment status of Sutter County with respect to ozone and PM10. In addition, because the FRAQMD's significance thresholds approximately correlate with reductions from heavy-duty vehicles and land use project emission reduction requirements in the SIP, project-generated emissions could also conflict with air quality planning efforts.	S	SU

2009 SPSP EIR IMPACTS

Air Quality		Level of Significance Prior to Mitigation	Level of Significance After Mitigation
3.4-8	**Generation of Local Mobile-Source CO Emissions**. Project-generated local mobile-source CO emissions would not result in or substantially contribute to concentrations that exceed the 1-hour ambient air quality standard of 20 ppm or the 8-hour standard of 9 ppm.	LS	NA
3.4-9	**Exposure of Sensitive Receptors to Short-and Long-Term Emissions of Toxic Air Contaminants**. Project implementation would result in exposure of receptors to short- and long-term emissions of TACs from on-site mobile and stationary sources.	PS	SU
3.4-10	**Possible exposure of Sensitive Receptors to Odorous Emissions**. Short-term construction and long-term operation of Phase 1 and Phase A could result in the frequent exposure of sensitive receptors to substantial objectionable odor emissions.	S	LS

LS=Less than Significant, S=Significant, PS=Potentially Significant, SU=Significant and Unavoidable, NA = Not Applicable

The following mitigation measure from the 2009 SPSP EIR was adopted for development in the SPSP Area by the Sutter County Board of Supervisors and they would mitigate air quality impacts associated with implementation of the proposed project. The County would ensure that construction and operation of the proposed project would be implemented consistent with the mitigation, monitoring and enforcement requirements for the 2009 SPSP EIR MMRP.

2009 SPSP EIR MITIGATION MEASURES

Air Quality	
3.4-1	Develop and Implement Applicable Air District-Endorsed Project-Level Air Quality Mitigation Plan for All Phases of Construction.

Environmental Checklist and Discussion

The following section addresses the effects of the proposed project on

Issues (and Supporting Information Sources):	*Potentially Significant Impact*	*Less Than Significant Impact*	*No Impact*	*Impact Adequately Addressed in 2009 SPSP EIR*
3. AIR QUALITY Where available, the significance criteria established by the applicable air quality management or air pollution control district may be relied upon to make the following determinations. **Would the project:**				
a) Conflict with or obstruct implementation of the applicable air quality plan?	☐	☐	☒	☐
b) Violate any air quality standard or contribute substantially to an existing or projected air quality violation?	☒	☐	☐	☐

Issues (and Supporting Information Sources):	Potentially Significant Impact	Less Than Significant Impact	No Impact	Impact Adequately Addressed in 2009 SPSP EIR
c) Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable federal or state ambient air quality standard (including releasing emissions which exceed quantitative thresholds for ozone precursors)?	☒	☐	☐	☐
d) Expose sensitive receptors to substantial pollutant concentrations?	☒	☐	☐	☐
e) Create objectionable odors affecting a substantial number of people?	☐	☒	☐	☐

Discussion

a) **No Impact.** The Reasonable Further Progress (RFP) Plan for the Federal 8-hour Ozone State Implementation Plan, the North Sacramento Planning Area 2006 Air Quality Management Plan (AQMP), and the Sutter County General Plan Update Technical Background Report (PBS&J, 2008) were reviewed to determine whether the project would conflict with implementation of these plans. The RFP was prepared with input from the five local air districts: SMAQMD, FRAQMD, the Yolo-Solano Air Quality Management District, the Placer County Air Pollution Control District, and the El Dorado County Air Quality Management District. The RFP documents the strategy that will be used in the Sacramento region to make progress toward attaining the federal ozone standard through the year 2011.

Although operation of the project would result in ozone emissions, the project would be consistent with the strategies and control measures in the RFP and AQMP because the main source of emissions would be from permitted operational sources. Compliance with strategies established by the plans also would provide consistency goals and policies for air quality in the Sutter County General Plan. Therefore, the project would not conflict with implementation of the applicable air quality plan. No impact would occur and this issue will not be evaluated in the Focused Tiered EIR.

b,c,d) **Potentially Significant.** Construction activities associated with development of the proposed project would generate temporary, short-term emissions of PM_{10}, ROG, and NO_X. Construction generated emissions of NO_X, an ozone precursor, could potentially exceed air district-recommended thresholds and would contribute to emissions concentrations that exceed the NAAQS or CAAQS. Further, a portion of the project route would be located within roadways in low density housing areas with sensitive receptors that could be exposed to construction generated emissions. This issue will be evaluated in the Focused Tiered EIR.

e) **Less Than Significant Impact.** The proposed project would result in temporary construction activities resulting in exhaust from construction equipment. Portions of the proposed project alignment are located within low-density housing areas. Construction of the wastewater conveyance pipeline through these areas would be completed at a rate of 1,000 feet per day and would not expose a substantial number of people to odors. Further, the project would construct underground wastewater conveyance infrastructure that would not produce objectionable odors under most conditions. Because underground wastewater conveyance infrastructure typically do not result in objectionable odors, and project facilities are sited away from existing sensitive receptors, it is not anticipated that sensitive receptors would be adversely affected. Further, the proposed project may result in construction of an odor control building at the connection with the UNWI, if needed to prevent odors from escaping at the manhole at the connection. This impact is less than significant and it will not be evaluated in the Focused Tiered EIR.

Summary

Implementation of the proposed project would not conflict with or obstruct the implementation of an applicable air quality plan, or expose sensitive receptors to substantial pollutant concentrations or objectionable odors. 2009 SPSP EIR Mitigation Measure 3.4-1 would be implemented as part of the proposed project and would reduce the potential significant temporary construction impacts; however, this impact could remain significant and unavoidable. Therefore, the potential for the proposed project to generate significant temporary construction and long term operational emissions will be evaluated in the Focused Tiered EIR.

References

California Air Resources Board (CARB), 2008. 2006 Estimated Annual Average Emissions. Sacramento, CA. Available: http://www.arb.ca.gov/ch/chapis1/chapis1.htm. Accessed June 2008.

Feather River Air Quality Management District (FRAQMD), 2010. Indirect Source Review Guidelines. Available: http://fraqmd.org/Planning.html. Accessed: June 23, 2016.

PBS&J, 2008. Sutter County General Plan Update Technical Background Report. Available: https://www.co.sutter.ca.us/pdf/cs/ps/gp/tbr/tbr.pdf Accessed: June 23, 2016.

Sutter County, 2008. Sutter Pointe Specific Plan Project EIR, December 2008.

Biological Resources

Section 3.13 of the 2009 SPSP EIR addresses effects of growth under build out of the SPSP on biological resource. The following discussion summarizes information presented in Section 3.13, page 3.13-9 through 3.13-27 of the 2009 SPSP EIR.

Environmental Setting

Special-Status Wildlife Species

The 2009 SPSP EIR identified a total of 28 special-status wildlife species with the potential to occur in the project vicinity including records of giant garter snake (*Thamnophis gigas*), black-crowned night-heron (*Nycticorax nycticorax*), and burrowing owl (*Athene cunicularia*). Other special-status wildlife species that were determined to potentially occur in the project area are Swainson's hawk (*Buteo swainsoni*), white-tailed kite (*Elanus leucurus*), tricolored blackbird (*Agelaius tricolor*), white-faced ibis (*Plegadis chihi*), greater sandhill crane (*Grus Canadensis tabida*), loggerhead shrike (*Lanius ludovicianus*), and northwestern pond turtle (*Emys marmorata marmorata*). Vernal pool tadpole shrimp (*Lepidurus packardi*) and vernal pool fairy shrimp (*Branchinecta lynchi*) have been documented east of the project area but are not expected to occur on-site because no suitable vernal pool habitat has been identified. The seasonal wetland on the project area is not considered suitable habitat for venial pool tadpole shrimp or vernal pool fairy shrimp because it is located in a plowed field that has recently been used for growing hay (ECORP 2007).

Special-Status Plant Species

Eight special-status plants were evaluated for their potential to occur in the project area and in proposed off-site improvement areas. Two of the eight species were determined to have potential to occur on the project area: Sanford's arrowhead (*Sagittaria sanfordii*) and Delta tule pea (*Lathyrus jepsonii jepsonii*).

Wetland and Riparian Habitat Types

Wetland and riparian habitats present in the project area and adjacent to or within the proposed project alignment include irrigation canals and ditches, seasonal wetlands, freshwater emergent marsh, and riparian areas.

Natomas Basin Habitat Conservation Plan

The 2003 Natomas Basin Habitat Conservation Plan (NBHCP) (City of Sacramento 2003) was prepared by the City of Sacramento, Sutter County, and the Natomas Basin Conservancy (NBC). It was developed to promote biological conservation in conjunction with economic and urban development in the Natomas Basin. The NBHCP establishes a multispecies conservation program to minimize and mitigate the expected loss of habitat values and incidental take of "covered species" that could result from urban development and operation and maintenance of irrigation and drainage systems. The NBHCP authorizes take associated with 17,500 acres of urban development in southern Sutter County and in the city of Sacramento and Sacramento County (i.e., 8,050 acres for the city of Sacramento, 7,467 acres for Sutter County, and 1,983 acres of Metro Air Park in Sacramento County).

The NBHCP was developed to promote biological conservation within the Natomas Basin in conjunction with economic and urban development. The plan provides an expedited process for approving development projects and establishes a multispecies conservation program to minimize and mitigate the expected loss of habitat values and incidental take of 22 "covered species" that could result from that development. The Natomas Basin consists of ±53,000 acres. The NBHCP authorizes take associated with 17,500 acres of urban development in the Basin, within southern Sutter County and within the City and County of Sacramento. USFWS approved the NBHCP in 2003 and issued Incidental Take Permits (ITP) to the City of Sacramento and Sutter County for take of federally listed species resulting from permitted activities. The ITPs provide authorization for take of covered species provided the proposed project conforms to the objectives and goals of the NBHCP. As described in the 2009 SPSP EIR, the boundaries of the project area are the same as the boundaries of the south Sutter permit area.

2009 SPSP EIR Standards of Significance

The 2009 SPSP EIR considers an impact to biological resources significant if build out of the SPSP would:

- Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special-status species in local or regional plans, policies, or regulations, or by CDFG or USFWS;
- Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, or regulations or by DFG or USFWS;
- Have a substantial adverse effect on federally protected wetlands as defined by Section 404 of the Clean Water Act (CWA) (including, but not limited to, marshes, vernal pools, and coastal areas) or any state-protected wetlands not subject to regulation under Section 404 of the CWA through direct removal, filling, hydrological interruption, or other means;

- Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites;
- Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance;
- Conflict with the provisions of an adopted habitat conservation plan; natural community conservation plan; or other approved local, regional, or state habitat conservation plan; or
- Substantially reduce the habitat of a fish or wildlife species; cause a fish or wildlife population to drop below self-sustaining levels; threaten to eliminate a plant or animal community; or substantially reduce the number or restrict the range of an endangered, rare, or threatened species.

2009 SPSP EIR Impacts and Mitigation Measures

Impacts of build out of the SPSP on biological resources are evaluated in Section 3.13 of the 2009 SPSP EIR. Biological resource impacts identified in the 2009 SPSP EIR that are relevant to the proposed project are presented below with their corresponding levels of significance before and after application of mitigation measures identified in the 2009 SPSP EIR.

2009 SPSP EIR IMPACTS

Biological Resources		Level of Significance Prior to Mitigation	Level of Significance After Mitigation
3.13-1	**Effects on Giant Garter Snake**. Implementation of the proposed project would result in both direct and indirect impacts on the giant garter snake. These impacts would include loss and degradation of existing habitat and effects on habitat connectivity.	PS	LS
3.13-2	**Potential Loss and Degradation of Jurisdictional Wetlands and Other Waters of the United States and Waters of the State**. Implementation of the proposed project could result in the placement of fill material into jurisdictional waters of the United States, including wetlands subject to USACE jurisdiction under the federal CWA, and the potential loss and degradation of wetland habitats protected under state and local regulations.	S	PSU
3.13-3	**Effects on Swainson's Hawk**. Implementation of the proposed project would result in the direct short- and long-term loss of Swainson's hawk foraging habitat within the project site and off-site improvement areas, potential nest tree removal, and disturbance during breeding season.	PS	LS
3.13-4	**Potential Loss and Degradation of Habitat for Special-Status Fish and Wildlife**. Implementation of the proposed project could result in the loss and degradation of habitat for a number of special-status wildlife species. The black-crowned night-heron and burrowing owl have both been documented on the project site. The project site and area proposed for off-site improvements provide potential habitat for vernal pool invertebrates, valley elderberry longhorn beetle, western spadefoot toad, northwestern pond turtle, burrowing owl and other raptors, tricolored blackbird, white-faced ibis, loggerhead shrike, and special-status fish species; however, these species are not known to occur in these areas.	S	LS
3.13-5	**Potential Loss and Degradation of Special-Status Plant Species and Habitat**. Implementation of the proposed project could result in direct and/or indirect impacts on special-status plant species and in the removal of vernal pool grassland, seasonal wetland, and riparian habitat along the off-site infrastructure alignments that have potential to support special-status plant species.	PS	LS
3.13-6	**Consistency with the NBHCP**. Implementation of the proposed project and the mitigation measures presented in this EIR would be consistent	LS	NA

2009 SPSP EIR IMPACTS

Biological Resources	Level of Significance Prior to Mitigation	Level of Significance After Mitigation
with the NBHCP and would not preclude the attainment of any goals or objectives included in the plan.		

LS=Less than Significant, S=Significant, PS=Potentially Significant, SU=Significant and Unavoidable, NA = Not Applicable

The following mitigation measures from the 2009 SPSP EIR were adopted for development in the SPSP Area by the Sutter County Board of Supervisors and they would mitigate biological resources impacts associated with implementation of the proposed project. The County would ensure that construction and operation of the proposed project would be implemented consistent with the mitigation, monitoring and enforcement requirements for the 2009 SPSP EIR MMRP.

2009 SPSP EIR MITIGATION MEASURES

Biological Resources	
3.13-1a	Implement NBHCP ITP Giant Garter Snake Mitigation Measures
3.13-1b	Implement Measures to Mitigate Impacts on the Giant Garter Snake That Are Not Covered by the NBHCP.
3.13-2	Secure Clean Water Act Section 404 and 401 Permits and Streambed Alteration Agreements; Implement All Permit Conditions; and Ensure No Net Loss of Wetlands, Other Waters of the United States, and Associated Functions and Values.
3.13-3a	Implement NBHCP ITP Swainson's Hawk Avoidance and Minimization Measures.
3.13-3b	Implement Measures to Mitigate Impacts on Swainson's Hawk Not Covered by the NBHCP.
3.13-4a	Implement NBHCP ITP Avoidance and Minimization Measures for Valley Elderberry Longhorn Beetle, White- Faced Ibis, Loggerhead Shrike, Burrowing Owl, Northwestern Pond Turtle, California Tiger Salamander, Western Spadefoot Toad, and Vernal Pool Invertebrates.
3.13-4b	Implement Measures to Mitigate Impacts on Special-Status Wildlife Species Not Covered by the NBHCP.
3.13-5a	Implement NBHCP ITP Avoidance and Minimization Measures for Impacts on Special-Status Plant Species.
3.13-5b	Implement Measures to Mitigate Impacts on Special-Status Plants Not Covered by the NBHCP.

Environmental Checklist and Discussion

Issues (and Supporting Information Sources):	*Potentially Significant Impact*	*Less Than Significant Impact*	*No Impact*	*Impact Adequately Addressed in 2009 SPSP EIR*
4. BIOLOGICAL RESOURCES— Would the project:				
a) Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special-status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Game or U.S. Fish and Wildlife Service?	☐	☐	☐	☒

Issues (and Supporting Information Sources):	*Potentially Significant Impact*	*Less Than Significant Impact*	*No Impact*	*Impact Adequately Addressed in 2009 SPSP EIR*
b) Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, regulations or by the California Department of Fish and Game or U.S. Fish and Wildlife Service?	☒	☐	☐	☐
c) Have a substantial adverse effect on federally protected wetlands as defined by Section 404 of the Clean Water Act (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means?	☒	☐	☐	☐
d) Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites?	☐	☐	☐	☒
e) Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?	☐	☐	☐	☒
f) Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan?	☐	☐	☐	☒

Discussion

a,d-f) **Adequately Addressed in 2009 SPSP EIR.** The 2009 SPSP EIR noted that the build out of the SPSP, including all associated off-site infrastructure, is consistent with and covered by the NBHCP. The NBHCP authorizes take associated with 17,500 acres of urban development in the Basin, within southern Sutter County and within the City and County of Sacramento. USFWS approved the NBHCP in 2003 and issued ITPs to the City of Sacramento and Sutter County for take of federally listed species resulting from permitted activities. The ITP's provide authorization for take of covered species provided that projects conform to the objectives and goals of the NBHCP. The boundaries of the SPSP project area, including the project area, are the same as the boundaries of the NBHCP south Sutter permit area. Thus, Mitigation Measures specific to the ITP issued as part of the NBHCP will apply to the planned facilities. The 2009 SPSP EIR included the following NBHCP ITP mitigation to mitigate impacts to special status plants and wildlife: 2009 SPSP EIR Mitigation Measures 3.13-1a; 3.13-3a; 3.13-4a; and 3.13-5a.

The 2009 SPSP EIR also included the following mitigation measures for special status plant and wildlife species not covered by the NBHCP: Mitigation Measures 3.13-1b; 3.13-3b; 3.13-4b; and 3.13-5b.

Implementation of 2009 SPSP EIR Mitigation Measures 3.13-1, 3.13-3, 3.13-4, and 3.13-5 would mitigate proposed project impacts to special status plant and wildlife species to less-than-significant. Therefore, this impact is adequately addressed in the 2009 SPSP EIR and no further analysis is required. This issue will not be addressed in the Focused Tiered EIR.

b,c) **Potentially Significant Impact.** Implementation of the proposed project could result in the placement of fill material into riparian habitat and jurisdictional Waters of the U.S., including wetlands subject to USACE jurisdiction under the federal CWA, and the potential loss and degradation of wetland and riparian habitats and protected under state and local regulations. This potentially significant impact will be evaluated in the Focused Tiered EIR.

Summary

2009 SPSP EIR Mitigation Measures 3.13-1, 3.13-3, 3.13-4, and 3.13-5 would be implemented as part of the proposed project and would reduce the significance of impacts to special status species to a less than significant level. The proposed project would not exceed the levels of significance of special status species impacts previously addressed in the 2009 SPSP EIR, nor would it introduce any new significant impacts that were not previously addressed. This issue will not be evaluated in the Focused Tiered EIR. Implementation of 2009 SPSP EIR Mitigation Measure 3.13-2 would help reduce the potential loss and degradation of wetland and riparian habitats, jurisdictional wetlands and other Waters of the U.S. and Waters of the State; however, this impact could remain significant and unavoidable. Therefore, the potential for the proposed project to result in the loss or degradation of wetland and riparian habitat will be evaluated in the Focused Tiered EIR.

References

Sutter County, 2008. Sutter Pointe Specific Plan Project EIR, December 2008.

Cultural Resources

Section 3.15 of the 2009 SPSP EIR addresses the cultural resources effects of growth under build out of the SPSP. The following discussion summarizes information presented in Section 3.15, page 3.15-5 through 3.15-20 of the 2009 SPSP EIR.

Environmental Setting

The 2009 SPSP EIR identified 12 separate cultural resources sites and one rural historic landscape site within the project area. Of these 12 sites, three sites containing historic-era buildings/structures (EC-05-23, EC-07-73, and EC-07-08) have yet to be evaluated for significance and are pending the results of further archival research and documentation to complete the evaluation process. Because evaluation of these three complexes has yet to be completed, development that involves removing these structures within the area proposed for on-site development was assumed to result in a significant and unavoidable impact.

The remaining resources outside the SPSP area include two within the proposed project force main alignment: the National Register eligible RD 1000 Historic Landscape, and a segment of Elkhorn Boulevard, a contributing element of RD 1000.

2009 SPSP EIR Standards of Significance

The 2009 SPSP EIR considers an impact to cultural resources significant if build out of the SPSP would:

- Cause a substantial adverse change in the significance of a historical resource, as defined in Section 15064.5 of the State CEQA Guidelines;
- Cause a substantial adverse change in the significance of a unique archaeological resource, as defined in Section 15064.5 of the State CEQA Guidelines or Public Resources Code Section 21083.2; or
- Disturb any human remains, including those interred outside formal cemeteries.

Paleontological Resources

For the purpose of this analysis, the following applicable thresholds of significance have been used to determine whether implementing the proposed project would result in a significant impact to Paleontological Resources. These thresholds of significance are based on Appendix G to the State CEQA Guidelines and consider a paleontological resources impact to be significant if implementation of the proposed project would directly or indirectly destroy a unique paleontological resource or site.

2009 SPSP EIR Impacts and Mitigation Measures

Impacts of the build out of the SPSP on cultural resources and paleontological resources are evaluated in Section 3.15 and 3.6, respectively, of the 2009 SPSP EIR. Cultural and paleontological resource impacts identified in the 2009 SPSP EIR that are relevant to the proposed project are presented below with their corresponding levels of significance before and after application of mitigation measures identified in the 2009 SPSP EIR.

2009 SPSP EIR IMPACTS

Cultural Resources		Level of Significance Prior to Mitigation	Level of Significance After Mitigation
3.15-1	**Damage to or Destruction of Historic-Era Identified Resources.** Implementation of the proposed project would result in ground disturbance to a depth of several feet and removal of certain existing structures, which may result in damage or destruction to identified historic-era building/structure complexes.	PS	PSU
3.15-2	**Damage to or Destruction of Undocumented Subsurface Archaeological Resources during Construction**. Because of the project's proximity to Curry Creek and the Sacramento River, there is a potential for unidentified archaeological resources, particularly the remains of Native American occupation, to be encountered during ground-disturbing activities.	PS	LS
3.15-3	**Damage to or Destruction of Human Remains during Construction**. Numerous Native American habitation sites, many of which contain human remains, have been documented within and on the periphery of the Natomas Basin. Although none are known to exist within the project site, there is a potential for previously unknown human remains to be located below the surface both on-site and off-site.	PS	LS
3.15-4	**Damage to or Destruction of Cultural Resources in Unsurveyed Areas**. Portions of the project site either have not been subjected to systematic inventory or are covered with a dense cover of vegetation that precludes observation of the surface and assessment of the presence of cultural resources.	PS	LS
3.6-6	**Possible Damage to Unknown, Potentially Unique Paleontological Resources during Earthmoving Activities**. Construction activities could disturb previously unknown paleontological resources at the project site and along the alignments of the off-site elements.	PS	LS

LS=Less than Significant, S=Significant, PS=Potentially Significant, SU=Significant and Unavoidable, NA = Not Applicable

The following mitigation measures from the 2009 SPSP EIR were adopted for development in the SPSP Area by the Sutter County Board of Supervisors and they would mitigate cultural resources impacts associated with implementation of the proposed project. The County would ensure that construction and

operation of the proposed project would be implemented consistent with the mitigation, monitoring and enforcement requirements for the 2009 SPSP EIR MMRP.

2009 SPSP EIR MITIGATION MEASURES

Cultural Resources	
3.15-2	Educate Construction Workers regarding Buried Cultural Resources, Suspend Ground-Disturbing Activities if Resources are Encountered, and Employ an Archaeologist to Assess the Find.
3.15-3	Suspend Ground-Disturbing Activities if Undocumented Human Remains are Encountered and follow California Health and Safety Code Procedures.
3.6-6	Conduct Construction Worker Personnel Training, Stop Work if Paleontological Resources Are Encountered, and Implement Paleontological Resources Recovery Plan.

Environmental Checklist and Discussion

Issues (and Supporting Information Sources):		*Potentially Significant Impact*	*Less Than Significant Impact*	*No Impact*	*Impact Adequately Addressed in 2009 SPSP EIR*
5.	**CULTURAL RESOURCES— Would the project:**				
a)	Cause a substantial adverse change in the significance of a historical resource as defined in §15064.5?	☐	☐	☒	☐
b)	Cause a substantial adverse change in the significance of a unique archaeological resource pursuant to §15064.5?	☒	☐	☐	☐
c)	Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?	☐	☐	☐	☒
d)	Disturb any human remains, including those interred outside of formal cemeteries?	☒	☐	☐	☐

Discussion

a) **No Impact.** As described above, the 2009 SPSP EIR identified three sites containing historic-era buildings/structures (EC-05-23, EC-07-73, and EC-07-08) that have yet to be evaluated for significance and are pending the results of further archival research and documentation to complete the evaluation process. Because evaluation of these three complexes has yet to be completed, development that involves removing these structures within the area proposed for on-site development was assumed to result in a significant and unavoidable impact. However, construction of proposed project facilities would not disturb the three identified sites containing historic-era buildings/structures (EC-05-23, EC-07-73, and EC-07-08) and, therefore, the proposed project would not cause a substantial adverse change in the significance of these historical resources. However**,** the proposed project is located within the boundaries of the National Register-eligible RD 1000 Historic Landscape District, and intersects Elkhorn Boulevard (P-34-886H), a contributing element of the district. Construction of the proposed below grade pipelines would not result in permanent or significant impacts to Elkhorn Boulevard as a contributor to the RD 1000 Historic Landscape District. No other historic-period built resources were identified within proposed project site and no impact would occur. This issue will not be evaluated in the EIR.

b,d) **Potentially Significant Impact.** Numerous Native American habitation sites, many of which contain human remains, have been documented within and on the periphery of the Natomas Basin.

Although none are known to exist within the project area, there is a potential for previously unknown human remains and undiscovered artifacts to be located below the surface. Construction of all project facilities will require excavation and grading which could result in the potential uncovering of unidentified and previously unknown human remains and undiscovered artifacts. Therefore, the proposed project could result in potential damage or destruction to unidentified archaeological resources and unidentified human remains during project construction resulting in potentially significant impact. This issue will be addressed in the Focused Tiered EIR.

c) **Adequately Addressed in 2009 SPSP EIR.** Construction of all project facilities will require excavation and grading which could result in the potential uncovering of unidentified and previously unknown paleontological resources in the project area. Implementation of 2009 SPSP EIR Mitigation Measure 3.6-6 would reduce potential damage or destruction to unidentified paleontological resources during project construction to a less-than significant level. Therefore, this impact is adequately addressed in the 2009 SPSP EIR and no further analysis is required. This issue will not be addressed in the Focused Tiered EIR.

Summary

2009 SPSP EIR Mitigation Measures 3.6-6, 3.15-2, and 3.15-3 would be implemented as part of the proposed project and would reduce the significance of cultural and paleontological resources impacts to a less-than-significant level. The proposed project would not exceed the levels of significance of cultural resources impacts previously addressed in the 2009 SPSP EIR, however, the proposed project could result in new significant impacts to cultural resources that were not previously addressed. This issue will be evaluated in the Focused Tiered EIR.

References

Sutter County, 2008. Sutter Pointe Specific Plan Project EIR, December 2008.

Geology, Soils, and Seismicity

Section 3.6 of the 2009 SPSP EIR addresses the geology, soils and seismicity impacts of growth under build out of the SPSP. The following discussion summarizes information presented in Section 3.6, page 3.6-4 through 3.6-21 of the 2009 SPSP EIR.

Environmental Setting

Fault Ground Rupture and Seismic Ground Shaking

Surface rupture is an actual cracking or breaking of the ground along a fault during an earthquake. Structures built over an active fault can be torn apart if the ground ruptures. Surface ground rupture along faults is generally limited to a linear zone a few meters wide. The Alquist-Priolo Act was created to prohibit the location of structures designed for human occupancy across the traces of active faults, thereby reducing the loss of life and property from an earthquake. Because no active faults have been mapped across the project area by the California Geological Survey (CGS) or USGS and the project area is not located in an Alquist-Priolo Earthquake Fault Zone, fault ground rupture does not represent a hazard (CGS 2007, Hart and Bryant 1999).

Even though no known active faults bisect the project area, the Willows fault zone runs through the middle of the project area in a southeast-to-northwest direction. The zone roughly parallels Interstate 5 from Sacramento to Red Bluff. The system is not considered active (i.e., having surface displacement within the last 11,000 years, during the Holocene epoch) by the CGS (Petersen et al. 1996). Geomorphic evidence indicates that fault movement occurred during the Pre-Quaternary Period (more than approximately 1.6 million years ago) (Lettis 1982, Bartow 1991, Jennings 1994). The project area is located approximately 15 miles from the Dunnigan Hills (Zamora) fault, which shows evidence of displacement during the Holocene epoch.

Liquefaction

Soil liquefaction occurs when ground shaking from an earthquake causes a sediment layer saturated with groundwater to lose strength and take on the characteristics of a fluid, thus becoming similar to quicksand.

The possibility that liquefaction will occur is greatest in loose sands and peat deposits where the groundwater level is near the ground surface and an active seismic source is located relatively close by. The Wallace Kuhl & Associates Geotechnical Engineering Report (2004), prepared for the 850-acre property at the southwest corner of the intersection of Riego Road and SR 99/70, concluded that despite the shallow groundwater table (5 to 10 feet below the ground surface), liquefaction would be extremely unlikely because the property is underlain by stiff and dense soils.

The Wallace Kuhl & Associates Preliminary Geotechnical Engineering Report (2005), prepared for the 2,700- acre property at the intersection of Riego Road and SR 99/70, concluded that because that property is underlain by loose, cohensionless soils that are saturated (because of the low groundwater table), it could be susceptible to liquefaction. In 2006, Wallace Kuhl & Associates performed a Supplementary Geotechnical Engineering Liquefaction Study for this property. Although the testing results indicated that only one-quarter inch of settlement would be likely if liquefaction were to occur, which is not a substantial hazard to development, Wallace Kuhl noted that only a limited amount of testing was performed and due to the large size of the property, recommended that additional site-specific testing related to liquefaction hazards should be performed.

The remainder of the project area has not been evaluated for potential hazards related to liquefaction.

Subsidence and Lateral Spreading

Subsidence is a gradual settling or sinking of the earth's surface with little or no horizontal motion. According to Wallace Kuhl & Associates (2005), the potential for lateral spreading occurring during or after seismic events at the 2,700-acre Riego Road property is low, provided prudent geotechnical engineering recommendations are followed during site preparation and foundation construction. The remainder of the project area has not been evaluated by a geotechnical engineer for potential hazards related to subsidence and lateral spreading.

Slope Stability

A landslide is the downhill movement of masses of earth material under the force of gravity. A review of topographic maps and aerial photographs indicates that the project area is located in an area of nearly flat topography, and it is not located adjacent to any steep slopes where a landslide could occur or has occurred in the past.

Seismic Seiches

Because of the long distance of the project area from the ocean, seismic sea waves would not be a factor at the project area. A seiche is a sloshing of water in an enclosed or restricted water body, such as a basin, river, or lake that is caused by earthquake motion; the sloshing can occur for a few minutes or several hours. Although an 1868 earthquake along the Hayward fault in the San Francisco Bay Area is known to have generated a seiche along the Sacramento River, the affected area was located in the Sacramento–San Joaquin River Delta. Seiches are not likely to occur in the vicinity of the project area.

2009 SPSP EIR Standards of Significance

The 2009 SPSP EIR considers an impact relating to geology, soils, and seismicity significant if build out of the SPSP would:

- Result in substantial soil erosion or the loss of topsoil;
- Expose people or structures to potential substantial adverse effects, including the risk of loss, injury, or death involving:
  - The rupture of a known earthquake fault as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known active fault;
  - Strong seismic ground shaking;
  - Seismic-related ground failure, including liquefaction; or
  - Landslides;
- Be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landsliding, lateral spreading, subsidence, liquefaction, or collapse; or
- Be located on expansive soil, as defined in Table 18-1-B of the UBC (1994), creating substantial risks to life or property.

2009 SPSP EIR Impacts and Mitigation Measures

Impacts of the build out of the SPSP on geology, soils, and seismicity are evaluated in Section 3.6 of the 2009 SPSP EIR. As described above, the proposed project is within the scope of the analysis of the 2009 SPSP EIR. Significant and potentially significant geology, soils, and seismicity impacts identified in the 2009 SPSP EIR that are relevant to the proposed project are presented below with their corresponding levels of significance before and after application of mitigation measures identified in the 2009 SPSP EIR.

2009 SPSP EIR IMPACTS

	Geology, Soils and Seismicity	Level of Significance Prior to Mitigation	Level of Significance After Mitigation
3.6-1	**Potential Temporary, Short-Term Construction-Related Erosion**. Construction activities during project implementation would involve extensive grading and movement of earth, which could temporarily expose soils to erosion.	PS	LS
3.6-2	**Risks to People and Structures Caused by Surface Fault Rupture and Strong Seismic Ground Shaking**. People and structures on the project site could be susceptible to damage from strong seismic ground	PS	LS

2009 SPSP EIR IMPACTS

	Geology, Soils and Seismicity	Level of Significance Prior to Mitigation	Level of Significance After Mitigation
	shaking.		
3.6-3	**Seismically Induced Risks to People and Structures Caused by Liquefaction**. Soil and groundwater conditions within a portion of the project site render it susceptible to liquefaction from strong seismic ground shaking.	PS	LS
3.6-4	**Seismically Induced Risks to People and Structures Caused by Landsides.** The project site and off-site elements are located in an area of relatively flat topography and are not located in or near a landslide hazard area.	LS	NA
3.6-5	**Potential Damage to Structures and Infrastructure from Construction on Expansive/Unstable Soils**. Portions of the project site and off-site improvements are underlain by soils that have a moderate to high potential for expansion when wet and may also contain areas of unstable soils.	PS	LS

LS=Less than Significant, S=Significant, PS=Potentially Significant, SU=Significant and Unavoidable, NA = Not Applicable

The following mitigation measures from the 2009 SPSP EIR were adopted for development in the SPSP Area by the Sutter County Board of Supervisors and they would mitigate impacts relating to geology, soils, and seismicity associated with implementation of the proposed project. The County would ensure that construction and operation of the proposed project would be implemented consistent with the mitigation, monitoring and enforcement requirements for the 2009 SPSP EIR MMRP.

2009 SPSP EIR MITIGATION MEASURES

Geology, Soils and Seismicity	
3.6-1	Prepare and Implement a Grading and Erosion Control Plan.
3.6-2a	Prepare a Final Geotechnical Report, and Implement All Applicable Recommendations.
3.6-2b	Monitor On- and Off-Site Earthwork.

Environmental Checklist and Discussion

Issues (and Supporting Information Sources):	*Potentially Significant Impact*	*Less Than Significant Impact*	*No Impact*	*Impact Adequately Addressed in 2009 SPSP EIR*
6. GEOLOGY, SOILS, AND SEISMICITY— Would the project:				
a) Expose people or structures to potential substantial adverse effects, including the risk of loss, injury, or death involving:				

Issues (and Supporting Information Sources):	*Potentially Significant Impact*	*Less Than Significant Impact*	*No Impact*	*Impact Adequately Addressed in 2009 SPSP EIR*
i) Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault? (Refer to Division of Mines and Geology Special Publication 42.)	☐	☐	☒	☐
ii) Strong seismic ground shaking?	☐	☐	☐	☒
iii) Seismic-related ground failure, including liquefaction?	☐	☐	☐	☒
iv) Landslides?	☐	☐	☒	☐
b) Result in substantial soil erosion or the loss of topsoil?	☐	☐	☐	☒
c) Be located on geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction, or collapse?	☐	☐	☐	☒
d) Be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating substantial risks to life or property?	☐	☐	☐	☒
e) Have soils incapable of adequately supporting the use of septic tanks or alternative wastewater disposal systems where sewers are not available for the disposal of wastewater?	☐	☐	☒	☐

Discussion

a.i) **No Impact.** The 2009 SPSP EIR found that no active faults have been mapped across the project area by the CGS or USGS and that the project area is not located in an Alquist-Priolo Earthquake Fault Zone, fault ground rupture does not represent a hazard at the project. No impact would occur and this issue will not be addressed in the Focused Tiered EIR.

a.ii) **Adequately Addressed in 2009 SPSP EIR.** The 2009 SPSP EIR found that people and structures in the project area could be susceptible to damage from strong seismic ground shaking. However, as described above, the project area is not in an area of active earthquake faults and with the implementation of 2009 SPSP EIR Mitigation Measure 3.6-2a potential impacts from known earthquake faults and associated seismic ground shaking to people or structures that would result from construction and operation of the proposed project are considered to be less-than significant. Therefore, this impact is adequately addressed in the 2009 SPSP EIR and no further analysis is required. This issue will not be addressed in the Focused Tiered EIR.

a.iii) **Adequately Addressed in 2009 SPSP EIR.** The 2009 SPSP EIR found that soil and groundwater conditions within a portion of the project area render it susceptible to liquefaction from strong seismic ground shaking. However, implementation of 2009 SPSP EIR Mitigation Measure 3.6-2a would reduce impacts associated with liquefaction on project facilities to a less-than significant level. Therefore, this impact is adequately addressed in the 2009 SPSP EIR and no further analysis is required. This issue will not be addressed in the Focused Tiered EIR.

a.iv) **No Impact.** The project area is located in an area of relatively flat topography and not located in or near a landslide hazard area. No construction is proposed on or directly adjacent to existing levees, which are the only local features where slope instability could occur in the study area. No impact would occur and this issue will not be addressed in the Focused Tiered EIR.

b) **Adequately Addressed in 2009 SPSP EIR.** Construction activities of proposed project would involve grading and movement of earth, which could temporarily expose soils to erosion. Implementation of 2009 SPSP EIR Mitigation Measures 3.6-1**,** 3.6-2a**,** and Mitigation Measure 3.6-2b would reduce project impacts associated with soil erosion and loss of topsoil to a less-than significant level. Therefore, this impact is adequately addressed in the 2009 SPSP EIR and no further analysis is required. This issue will not be addressed in the Focused Tiered EIR.

c,d) **Adequately Addressed in 2009 SPSP EIR.** The 2009 SPSP EIR identified that nearly all of the soil map units that are associated with the proposed municipal water supply system are expansive, with a high shrink-swell capacity. Construction on expansive soils can lead to cracking of driveways, roads, and foundations, and disruption of pipelines and other utilities. It is also possible that with operation of the municipal proposed project, specifically groundwater pumping, could result in ground subsidence. Damaging effects from subsidence could include gradient changes in water supply transmission lines, damage to water wells resulting from sediment compaction, and increased flooding of low-lying areas. However, implementation of 2009 SPSP EIR Mitigation Measure 3.6-2a would reduce impacts associated with unstable or expansive soils to a less-than significant level. Therefore, this impact is adequately addressed in the 2009 SPSP EIR and no further analysis is required. This issue will not be addressed in the Focused Tiered EIR.

e) **No Impact.** The proposed project is a wastewater conveyance system designed to provide the SPSP Phase I and future development within the SPSP area connection to Regional San's wastewater treatment plant. The proposed project would not include septic tanks or alternative wastewater disposal systems and no impact would occur. This issue will not be addressed in the Focused Tiered EIR.

Summary

2009 SPSP EIR Mitigation Measures 3.6-1, 3.6-2a, and 3.6-2b would be implemented as part of the proposed project and would reduce significance of geology, soils, and seismicity impacts to a less-than-significant level. The proposed project would not exceed the levels of significance of geology, soils, and seismicity impacts previously addressed in the 2009 SPSP EIR, nor would it introduce any new significant geology, soils, and seismicity impacts that were not previously addressed. This issue will not be evaluated in the Focused Tiered EIR.

References

Sutter County, 2008. Sutter Pointe Specific Plan Project EIR, December 2008.

Greenhouse Gas Emissions

Section 3.17 of the 2009 SPSP EIR addresses the impacts of greenhouse gas emissions of growth under build out of the SPSP. The following discussion summarizes information presented in Section 3.17, page 3.17-1 through 3.17-9 of the 2009 SPSP EIR.

Background

In 2014, total U.S. greenhouse gas emissions were 6,870.5 million metric tons (MMT) of CO2e (EPA, 2016.). CO_2 equivalent (CO_2e) is a measurement used to account for the fact that different greenhouse gases (GHGs) have different potential to retain infrared radiation in the atmosphere and contribute to the greenhouse effect. This potential, known as the global warming potential (GWP) of a GHG, depends largely on the lifetime, or persistence, of the gas molecule in the atmosphere. For example, as described in

the *General Reporting Protocol of the California Climate Action Registry* (CCAR, 2009), 1 ton of CH_4 contributes the same amount to the greenhouse effect as approximately 21 tons of carbon dioxide (CO_2), and 1 ton of N_2O contributes the same amount as approximately 310 tons of CO_2. Therefore, CH_4 and N_2O are much more potent GHGs than CO_2. CH_4 results from off-gassing (the release of chemicals from nonmetallic substances under ambient or greater pressure conditions) associated largely with agricultural practices and landfills. Relatively small levels of N_2O are generated by internal combustion engines. Expressing emissions in CO_2e takes all GHG emissions that contribute to the greenhouse effect and converts them to a single unit, equivalent to the effect that would occur if only CO_2 were being emitted.

Regulatory Background

State Plans, Policies, Regulations, and Laws

Various statewide and local initiatives to reduce California's contribution to GHG emissions have raised awareness that even though the various contributors to and consequences of global climate change are not yet fully understood, global climate change is occurring, and that there is a real potential for severe adverse environmental, social, and economic effects in the long term. The following is a summary of the various statewide and local initiatives in place in California to address GHG emissions:

- Assembly Bill 1493
- Executive Order S-3-05
- Assembly Bill 32, California Global Warming Solutions Act of 2006
- California Climate Action Registry
- Senate Bill 1368
- Executive Order S-1-07
- Senate Bill 97
- Senate Bills 1078 and 107 and Executive Order S-14-08
- Senate Bill 375
- Climate Change Scoping Plan
- OPR Proposed Amendments to the CEQA Guidelines
- ARB Draft GHG Significance Thresholds

2009 SPSP EIR Standards of Significance

The 2009 SPSP EIR used a qualitative analysis to determine whether the GHG emissions associated with the proposed project would be cumulatively considerable (significant). The impact discussion addressed the question of whether land uses developed under the proposed SPSP would achieve a 30% reduction in GHG emissions compared to "business-as-usual" emission levels projected for 2020.

2009 SPSP EIR Impacts and Mitigation Measures

Impacts of the build out of the SPSP on GHG Emissions are evaluated in Section 3.17 of the 2009 SPSP EIR. As described above, the proposed project is within the scope of the analysis of the 2009 SPSP EIR. Significant and potentially significant GHG Emissions impacts identified in the 2009 SPSP EIR that are relevant to the proposed project are presented below with their corresponding levels of significance before and after application of mitigation measures identified in the 2009 SPSP EIR.

2009 SPSP EIR IMPACTS

Greenhouse Gas Emissions		Level of Significance Prior to Mitigation	Level of Significance After Mitigation
3.17-1	**Generation of Temporary, Short-Term Construction-Related GHG Emissions.** Project-related construction activities associated with development of the proposed project would result in increased generation of GHGs. These emissions would be temporary and short-term and would decline over time as new regulations are developed that address medium- and heavy-duty on-road vehicles and off-road equipment under the mandate of AB 32. However, based on current technology and measured against current standards, project-related construction emissions of GHGs are expected to be substantial and would contribute considerably to cumulative construction-related GHG emissions.	S	SU
3.17-2	**Increased Long-Term Operational GHG Emissions.** Operation of the proposed project over the long term would result in increased generation of GHGs, which would contribute considerably to cumulative GHG emissions.	S	SU

LS=Less than Significant, S=Significant, PS=Potentially Significant, SU=Significant and Unavoidable, NA = Not Applicable

The following mitigation measure from the 2009 SPSP EIR was adopted for development in the SPSP Area by the Sutter County Board of Supervisors and would mitigate, to the extent feasible, greenhouse gas impacts associated with implementation of the proposed project. The CPUC would ensure that construction and operation of the proposed project would be implemented consistent with the mitigation, monitoring and enforcement requirements for the 2009 SPSP EIR MMRP.

2009 SPSP EIR MITIGATION MEASURES

Greenhouse Gas Emissions	
3.17-1	Implement Additional Measures to Reduce GHG Emissions.

Environmental Checklist and Discussion

Issues (and Supporting Information Sources):		*Potentially Significant Impact*	*Less Than Significant Impact*	*No Impact*	*Impact Adequately Addressed in 2009 SPSP EIR*
7.	**Greenhouse Gas Emissions—Would the project:**				
a)	Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?	☒	☐	☐	☐
b)	Conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gasses?	☒	☐	☐	☐

Discussion

a,b) **Potentially Significant Impact.** The 2009 SPSP EIR found that project-related construction activities, which includes construction of the proposed project, would result in increased

generation of GHGs. These emissions would be temporary and short-term and would decline over time as new regulations are developed that address medium- and heavy-duty on-road vehicles and off-road equipment. However, even with the implementation of 2009 SPSP EIR Mitigation Measures 3.17-1, project-related construction emissions of GHGs could be substantial and could contribute to cumulative construction-related GHG emissions and potentially impair the state's ability to implement Assembly Bill 32. This is a potentially significant impact and will be addressed in the Focused Tiered EIR.

Summary

2009 SPSP EIR Mitigation Measure 3.17-1 would be implemented as part of the proposed project; however, impacts associated with GHG emissions could remain significant and unavoidable. As a result, an evaluation of the GHG emissions contribution of the proposed project will be evaluated in the Focused Tiered EIR.

References

California Climate Action Registry (CCAR), 2009. California Climate Action Registry General Reporting Protocol. Available: http://sfenvironment.org/sites/default/files/fliers/files/ccar_grp_3-1_january2009_sfe-web.pdf. Accessed June 23, 2016.

Sutter County, 2008. Sutter Pointe Specific Plan Project EIR, December 2008.

U.S. Environmental Protection Agency (EPA), 2016. Inventory of U.S. Greenhouse Gas Emissions and Sinks: 1990 – 2014. Publication EPA 430-R-16-002. Available: https://www3.epa.gov/climatechange/Downloads/ghgemissions/US-GHG-Inventory-2016-Main-Text.pdf. Accessed June 23, 2016.

Hazards and Hazardous Materials

Section 3.12 of the 2009 SPSP EIR addresses the hazards and hazardous materials effects under build out of the SPSP. The following discussion summarizes information presented in Section 3.12, page 3.12-10 through 3.12-18 of the 2009 SPSP EIR.

Environmental Setting

Results of Records Search for Hazardous Materials

To determine the potential for hazardous materials contamination in or near the project area, seven Environmental Site Assessments (ESA's) including regulatory databases searches. No potential or confirmed state or federal "Superfund" sites were identified within one mile of the project area. There were also no known contaminated municipal groundwater wells, active or inactive landfills, or producing Department of Oil and Gas (DOG) petroleum wells located in or within one-half mile of the project area. Two abandoned DOG wells were found in the project area, but they had been abandoned appropriately in accordance with DOG environmental guidelines. There are no sites in the project area that may have potential hazardous materials contamination.

Hazards Associated with Surrounding Land Uses

Sacramento International Airport is located approximately 2.25 miles west of the project area. The airport is located 12 miles north of downtown Sacramento off Interstate 5. The Sacramento Airport Land Use Commission (ALUC) prepared a Comprehensive Land Use Plan (CLUP) in 1984 (last amended January 1994). The CLUP establishes planning boundaries for the airport and defines compatible types and patterns of future land use. The purpose of the CLUP is to provide the Sacramento International Airport land area with compatibility guidelines for height, noise, and safety.

The southwestern area of the SPSP area lies within two airport safety zones (Zone 2, Approach-Departure, and Zone 3, Overflight), where population densities are restricted because of the statistical likelihood of aircraft accidents in the area. Certain uses are compatible with the overflight zone only if they do not result in a large concentration of people. Among the land uses prohibited from the overflight zone are regional shopping centers, elementary and secondary schools, hospitals, communitywide and regional parks, theaters, and stadiums and arenas (Airport Land Use Commission 1994). In approach-departure zones, permitted land use types include parking lots, roads, train tracks, cemeteries, and agricultural and natural open space uses. In addition, a number of uses are specifically identified as incompatible, including uses that direct steady or flashing lights of particular colors that would be visible to aircraft, uses that cause sunlight to be reflected toward an aircraft, uses that would generate smoke or attract large concentrations of birds, uses that would cause electrical interference, and hazardous installations.

2009 SPSP EIR Standards of Significance

The 2009 SPSP EIR identifies a public safety or hazards impact to be considered significant if implementation of the proposed project would do any of the following:

- Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials;
- Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials to the environment;
- Emit hazardous emissions or involve the handling of hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school;
- Be located on a site that is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would create a significant hazard to the public or the environment;
- For a project located within an airport land use plan or within 2 miles of a public airport, result in a safety hazard for people residing or working in the project area;
- For a project located in the vicinity of a private air strip, result in a safety hazard for people residing or working in the project area;
- Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan;
- Expose people or structures to a significant risk of loss, injury, or death involving wildland fires, including where wildlands are adjacent to urbanized areas or residences are intermixed with wildlands;
- Create public health hazards from increased exposure to mosquitoes by providing substantial new habitat for mosquitoes or other vectors;

- Create a safety hazard for aircraft operations based on the presence of water bodies within five miles of the Sacramento International Airport; or
- Expose project residents to electrical or magnetic fields in excess of CDE school siting standards.

2009 SPSP EIR Impacts and Mitigation Measures

Impacts of the build out of the SPSP relating to hazards and hazardous materials are evaluated in Section 3.12 of the 2009 SPSP EIR. As described above, the proposed project is within the scope of the analysis of the 2009 SPSP EIR. Significant and potentially significant hazards and hazardous materials impacts identified in the 2009 SPSP EIR that are relevant to the proposed project are presented below with their corresponding levels of significance before and after application of mitigation measures identified in the 2009 SPSP EIR.

2009 SPSP EIR IMPACTS

Hazards and Hazardous Materials		Level of Significance Prior to Mitigation	Level of Significance After Mitigation
3.12-1	**Routine Transport, Use, or Disposal of Hazardous Materials**. Project implementation would involve the storage, use, and transport of hazardous materials at the project site during demolition, construction, and operation activities	LS	NA
3.12-2	**Potential Human Health Hazards from Exposure to Existing On-Site Hazardous Material**. Construction workers could be exposed to hazardous materials present on-site during construction activities, and hazardous materials on-site could create an environmental or health hazard if left in place.	PS	LS
3.12-3	**Public Health Hazards from Project Development on a Known Hazardous Materials Site Compiled Pursuant to Government Code Section 65962.5**. Two areas of the project site are listed on the Cortese List as known hazardous materials sites. Implementation of the proposed project could expose construction workers to hazardous materials from these sites during construction activities, and hazardous materials on-site could create an environmental or health hazard if left in place.	PS	LS
3.12-4	**Safety Hazard for People Residing or Working Near a Public or Private Airstrip**. A portion of the project site is located within Sacramento International Airport's designated safety zone.	PS	LS

LS=Less than Significant, S=Significant, PS=Potentially Significant, SU=Significant and Unavoidable, NA = Not Applicable

The following mitigation measures from the 2009 SPSP EIR were adopted for development in the SPSP Area by the Sutter County Board of Supervisors and they would mitigate hazards and hazardous materials impacts associated with implementation of the proposed project. The County would ensure that construction and operation of the proposed project would be implemented consistent with the mitigation, monitoring and enforcement requirements for the 2009 SPSP EIR MMRP.

2009 SPSP EIR MITIGATION MEASURES

Hazards and Hazardous Materials	
3.12-2	Retain a Licensed Professional to Investigate the Extent to Which Soil and/or Groundwater May Have Been Contaminated, Including in Areas Not Covered by the Phase I ESAs, and Implement Required Measures, as Necessary.
3.12-3	Retain Licensed Professional to Investigate the Environmental Status of the Contaminated Groundwater Plume, Contaminated Soils, and Any Remediation Activities at the Holt Tractor and Farm Air Service Sites, and Implement All Remedial Measures, as Necessary.

Environmental Checklist and Discussion

Issues (and Supporting Information Sources):		*Potentially Significant Impact*	*Less Than Significant Impact*	*No Impact*	*Impact Adequately Addressed in 2009 SPSP EIR*
8.	**HAZARDS AND HAZARDOUS MATERIALS Would the project:**				
a)	Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials?	☐	☒	☐	☐
b)	Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment?	☐	☒	☐	☐
c)	Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?	☐	☐	☒	☐
d)	Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment?	☐	☐	☐	☒
e)	For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard for people residing or working in the project area?	☐	☒	☐	☐
f)	For a project within the vicinity of a private airstrip, would the project result in a safety hazard for people residing or working in the project area?	☐	☒	☐	☐
g)	Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?	☐	☐	☒	☐
h)	Expose people or structures to a significant risk of loss, injury or death involving wildland fires, including where wildlands are adjacent to urbanized areas or where residences are intermixed with wildlands?	☐	☐	☒	☐

Discussion

a,b) **Less Thank Significant Impact.** Construction and operation of the proposed project could involve the use, storage and disposal of small quantities of hazardous materials. The use, storage, and transport of hazardous materials would be required to comply with applicable local, state, and federal regulations. Transportation of hazardous materials on area roadways is regulated by CHP

and Caltrans, and use of these materials is regulated by DTSC, as outlined in Title 22 of the CCR. Any project facilities that would use or store hazardous materials would be required to obtain permits and comply with appropriate regulatory agency standards designed to avoid hazardous waste releases. Because the proposed project is required by law to implement and comply with existing hazardous material regulations, impacts related to the creation of significant hazards to the public through routine, transport, use, disposal, and risk of upset would be less than significant. This issue will not be addressed in the Focused Tiered EIR.

c) **No Impact.** No existing schools are located or within one quarter of a mile of the project area. Therefore, there would be no impact and this issue will not be addressed in the Focused Tiered EIR.

d) **Adequately Addressed in 2009 SPSP EIR.** The 2009 SPSP EIR identified no sites in the project area that are listed on the Cortese List as known hazardous materials sites. Construction activities could result in exposure of unidentified on-site hazardous materials contamination that could create an environmental or health hazard. However, implementation of 2009 SPSP EIR Mitigation Measure 3.12-2 and Mitigation Measure: 3.12-3 would reduce exposure of on-site construction workers to unidentified hazardous materials to a less-than significant level. Therefore, this impact is adequately addressed in the 2009 SPSP EIR and no further analysis is required. This issue will not be addressed in the Focused Tiered EIR.

e,f) **Less Than Significant Impact.** The closest public airport is Sacramento International Airport, which is approximately 2.25 miles west of the project area. Development in the vicinity of Sacramento International Airport is guided by a CLUP, as described above, which is used to protect public health and safety and ensure compatible land uses in areas around the airport. The majority of the proposed project is outside the existing Sacramento Metropolitan Airport CLUP Safety Zones. Further, the proposed project would not result in above-ground structures. Therefore, this impact is considered to be less than significant and this issue will not be addressed in the Focused Tiered EIR.

g) **No Impact.** There are no specific guidelines for the project area identified within the Sutter County, California Multi-Hazard Mitigation Plan (Sutter County, 2008a). Further, the proposed project would not result in above-ground infrastructure that would impair or physically interfere with future adopted emergency plans. Therefore, the proposed project would not interfere with an adopted emergency response plan or evacuation plan. Therefore, there would be no impact and this issue will not be addressed in the Focused Tiered EIR.

h) **No Impact.** The project area is not within a wildland area that has a substantial forest fire risk (Calfire, 2010). Therefore, no impact would occur and this issue will not be addressed in the Focused Tiered EIR.

Summary

2009 SPSP EIR Mitigation Measures 3.12-2 and 3.12-3 would be implemented as part of the proposed project and would reduce impacts of hazards and hazardous materials to a less-than-significant level. The proposed project would not exceed the levels of significance of hazards and hazardous materials impacts previously addressed in the 2009 SPSP EIR, nor would it introduce any new significant hazards and hazardous materials impacts that were not previously addressed. This issue will not be evaluated in the Focused Tiered EIR.

References

Sutter County, 2008. Sutter Pointe Specific Plan Project EIR, December 2008.

Sutter County, 2008a. Sutter County, California Multi-Hazard Mitigation Plan, January 2008.

Sacramento County, 1994. Sacramento International Airport Comprehensive Land Use Plan. Amended January, 1994.

Calfire, 2010. Natural Hazard Disclosure (Fire) Map Images and Data. Accessed: http://www.fire.ca.gov/ab6/ab6lst.html on March 13, 2010

Hydrology and Water Quality

Impacts of the proposed project on hydrology and water quality are evaluated in Section 3.7, page 3.7-20 through 3.7-27 of the 2009 SPSP EIR. The proposed project is within the scope of analysis in the 2009 SPSP EIR. The project would not result in a change in conditions relating to hydrology and water quality and would have no new adverse effects on these resources.

Environmental Setting

Local Surface Water Hydrology

The project area generally slopes toward State Route (SR) 99/70 and southward. Elevations on the eastern end of the project area range from approximately 37 to 25 feet above mean sea level. The western end of the project area is relatively flat with elevations ranging from 22 to 19 feet. The southern end of the project area reaches a low elevation of approximately 14 feet. The NEMDC is located along the eastern boundary of the SPSP area with levee elevations ranging from 44 to 30 feet. At the southeast corner of the SPSP area elevations are approximately 25 feet, and slope is in a southwesterly direction. Local hydrology along the proposed pipeline alignment within Sacramento County includes ditches, streams, and culverts where roads cross over drainage features.

Surface Water Quality

Surface water quality in the hydrologic region is generally good, although possible sources of contamination that can affect water quality include turbidity, pesticides and fertilizer from agricultural runoff, elevated water temperature, and toxic heavy metals such as mercury, copper, zinc, and cadmium from acid mine drainage. The portion of the Sacramento River that is the receiving water for the Natomas Cross Canal (NCC) and other Natomas Basin drainage discharge points is part of a 16-mile segment from Knights Landing to the Delta that is on the 303(d) list for agricultural pesticides, polychlorinated biphenyls (PCBs), mercury from abandoned mines, and toxicity from unknown sources (State Water Resources Control Board. The NEMDC upstream of Arcade Creek is on the 303(d) list for PCBs, and downstream of Arcade Creek for PCBs, mercury, and pesticides.

Groundwater Hydrology

The project area is located within the North American Groundwater Subbasin, in the eastern central portion of the Sacramento Groundwater Basin. It is bounded on the north by the Bear River, on the west by the Feather and Sacramento Rivers, and on the south by the American River. The alluvium constitutes the upper aquifer zone, and occupies the upper 200 to 300 feet below ground surface. The lower aquifer zone generally occurs deeper than 300 feet towards the west side of the sub- basin. The cumulative thickness of these deposits increases from a few hundred feet near the Sierra Nevada foothills on the east to over 2,000 feet along the western margin of the subbasin. Most of the groundwater is produced in the northern portion of the subbasin.

Water level data for the project area are limited, but groundwater levels appear to have been consistently high (generally within 10 feet of the ground surface in spring) and relatively stable in recent years. Similar to the rest of the Natomas Basin, groundwater levels near the eastern edge of the project area are substantially affected by an existing cone of depression centered about 3 miles to the east.

Groundwater Quality

An evaluation of groundwater quality for the proposed project, performed by Luhdorff & Scalmanini Consulting Engineers, examined water quality data from 63 wells that are located on or near the project area. Water quality data were obtained from the following sources: U.S. Geological Survey (34 wells), California Department of Water Resources (DWR) (20 wells), California Department of Public Health (DPH) (three wells), and Paulson monitoring wells installed as part of a study by Luhdorff & Scalmanini Consulting Engineers 2008 study on six groundwater wells. Groundwater salinity was low in most wells, but tended to be slightly higher in the upper zone. Median Total Dissolved Solids (TDS) concentrations were 342 milligrams per liter (mg/l) in the upper zone, 335 mg/l in the lower zone, and 315 mg/l for wells completed in multiple or unknown zones. Results were similar for electrical conductivity (EC), which is another measure of salinity. In the project area, most wells had EC values between 250 and 500 micromhos per centimeter (µmhos/cm), which is indicative of low salinity groundwater. Only one well in the project area had an EC value over 500 µmhos/cm.

Arsenic concentrations were generally higher in the western and central portions of the Natomas Basin, except for a few wells along the Sacramento River that had lower concentrations. Arsenic concentrations were also low in the southeastern corner of the Natomas Basin, and were lowest in wells located to the east. Concentrations of arsenic and some other trace elements tended to be lower in shallower wells than in deeper wells. Manganese is the other trace element that showed elevated levels in groundwater from wells near the project area.

2009 SPSP EIR Standards of Significance

The 2009 SPSP EIR considers a hydrology and water quality Impact significant if build out of the SPSP would:

- Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, in a manner that would result in substantial erosion or siltation on-site or off-site;
- Violate any water quality standards or waste discharge requirements, including NPDES waste discharge or stormwater runoff requirements, state or federal antidegradation policies, enforceable water quality standards contained in the Central Valley RWQCB Basin Plan or statewide water-quality control plans, or federal
- Rulemakings to establish water quality standards in California;
- Create or contribute runoff water that would exceed the capacity (peak flow) of existing or planned stormwater drainage systems;
- Expose people or structures to a significant risk of loss, injury, or death involving flooding, including flooding as a result of the failure of a levee or dam;
- Place within a flood hazard area structures that would impede or redirect flood flows;
- Substantially deplete groundwater supplies or interfere substantially with groundwater recharge such that there would be a net deficit in aquifer volume or a substantial lowering of the level of the local groundwater table; or
- Substantially degrade water quality.

The 2009 SPSP EIR identifies the current Sacramento Area Flood Control Agency (SAFCA) criteria for determining the significance of hydraulic impacts as:

- the 100-year base flood elevation is increased;
- flooding occurs in an area that was not previously flooded; or
- encroachment occurs on design freeboard.

2009 SPSP EIR Impacts and Mitigation Measures

Impacts of build out of the SPSP on hydrology and water quality are evaluated in Section 3.7 of the 2009 SPSP EIR. As described above, the proposed project is within the scope of the analysis of the 2009 SPSP EIR. Significant and potentially significant hydrology and water quality impacts identified in the 2009 SPSP EIR that are relevant to the proposed project are presented below with their corresponding levels of significance before and after application of mitigation measures identified in the 2009 SPSP EIR.

2009 SPSP EIR IMPACTS

	Hydrology and Water Quality	**Level of Significance Prior to Mitigation**	**Level of Significance After Mitigation**
3.7-1:	**Potential Temporary Construction-Related Drainage and Water Quality Effects**. Construction activities during proposed project implementation would involve extensive grading and movement of earth, which would substantially alter on-site drainage patterns and could generate sediment, erosion, and other nonpoint source pollutants in on-site stormwater that could drain to offsite areas and degrade local water quality.	S	LS
3.7-2	**Potential Increased Risk of Flooding from Increased Stormwater Runoff**. Proposed project implementation would increase the amount of impervious surfaces on the project site, thereby increasing surface runoff. This increase in surface runoff would result in an increase in both the total volume and the peak discharge rate of stormwater runoff, and therefore could result in greater potential for on- and off-site flooding.	S	LS
3.7-3	**Flooding Risk from Potential for Levee or Dam Failure, or Inundation from Slow-rise Flooding during a 100-Year Flood Event**. The project site is located within a designated 100-year floodplain as currently delineated by FEMA.	PS	LS
3.7-4	**Potential Damage From 200-Year Flood Event**. The project site is located within an area that does not have 200-year flood protection, which will be required by SB 5.	PS	LS
3.7-5	**Long-Term Water Quality Effects from Urban Runoff**. The proposed project would convert a large area of undeveloped land to residential and commercial uses, thereby changing the amount and timing of potential long-term contaminants in stormwater runoff to the Natomas Basin Drainage System and other drainage courses on-site.	S	LS
3.7-6	**Depletion of Groundwater Supplies or Substantial Interference with Groundwater Recharge**. Shallow and deep percolation of rainwater and related runoff and consequent depth to groundwater could be affected locally by the development of additional impervious surface, which may limit infiltration and recharge. Furthermore, M&I groundwater use as part of the project could affect groundwater supplies.	LS	NA
3.7-7	**Potential for Project-Related Water Supply to Exceed Groundwater or Surface Water Quality Objectives**. Proposed project municipal groundwater or surface water from the Sacramento River that exceeds water quality standards for arsenic, or from contaminants from the Holt Site, could affect M&I water supplies for the proposed project.	PS	LS

LS=Less than Significant, S=Significant, PS=Potentially Significant, SU=Significant and Unavoidable, NA = Not Applicable

The following mitigation measures from the 2009 SPSP EIR were adopted for development in the SPSP area by the Sutter County Board of Supervisors and they would mitigate hydrology and water quality related impacts associated with implementation of the proposed project. The County would ensure that construction and operation of the proposed project would be implemented consistent with the mitigation, monitoring and enforcement requirements for the 2009 SPSP EIR MMRP.

2009 SPSP EIR MITIGATION MEASURES

Hydrology and Water Quality	
3.7-1	Acquire Appropriate Regulatory Permits and Implement SWPPP and BMPs.
3.7-2a	Prepare and Submit Final Drainage Plans to the County and Implement Requirements Contained in Those Plans.
3.7-4a	Incorporate Flood Control Measures to Provide Protection from 200-Year Sankey Gap Flood Flows. On-Site and Off-Site Elements
3.7-5	Develop and Implement a BMP and Water Quality Maintenance and Monitoring Plan.

Environmental Checklist and Discussion

Issues (and Supporting Information Sources):		*Potentially Significant Impact*	*Less Than Significant Impact*	*No Impact*	*Impact Adequately Addressed in 2009 SPSP EIR*
9.	**HYDROLOGY AND WATER QUALITY— Would the project:**				
a)	Violate any water quality standards or waste discharge requirements?	☐	☐	☐	☒
b)	Substantially deplete groundwater supplies or interfere substantially with groundwater recharge such that there would be a net deficit in aquifer volume or a lowering of the local groundwater table level (e.g., the production rate of pre-existing nearby wells would drop to a level which would not support existing land uses or planned uses for which permits have been granted)?	☐	☐	☐	☒
c)	Substantially alter the existing drainage pattern of a site or area through the alteration of the course of a stream or river, or by other means, in a manner that would result in substantial erosion or siltation on- or off-site?	☐	☐	☐	☒
d)	Substantially alter the existing drainage pattern of a site or area through the alteration of the course of a stream or river or, by other means, substantially increase the rate or amount of surface runoff in a manner that would result in flooding on- or off-site?	☐	☐	☐	☒
e)	Create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff?	☐	☐	☐	☒
f)	Otherwise substantially degrade water quality?	☐	☐	☐	☒
g)	Place housing within a 100-year flood hazard area as mapped on a federal Flood Hazard Boundary or Flood Insurance Rate Map or other authoritative flood hazard delineation map?	☐	☐	☒	☐

Issues (and Supporting Information Sources):	Potentially Significant Impact	Less Than Significant Impact	No Impact	Impact Adequately Addressed in 2009 SPSP EIR
h) Place within a 100-year flood hazard area structures that would impede or redirect flood flows?	☐	☐	☒	☐
i) Expose people or structures to a significant risk of loss, injury or death involving flooding, including flooding as a result of the failure of a levee or dam?	☐	☐	☐	☒
j) Expose people or structures to a significant risk of loss, injury or death involving inundation by seiche, tsunami, or mudflow?	☐	☐	☒	☐

Discussion

a,f) **Adequately Addressed in 2009 SPSP EIR.** Construction of the proposed project could result in a substantial increase in storm-induced erosion and sedimentation in surface waters located downstream of the construction activities. Furthermore, pollutants that are associated with construction equipment, such as lubricants and fuel, could migrate into receiving waters if appropriate management measures are not implemented. Construction of proposed project would require dewatering activities for the pump stations and where groundwater levels are shallow along the pipeline route. Water from dewatering activities would need to be discharged to an area of land or surface water that can accept the volume of water. Efforts would be made to find a location to discharge to land. Should a discharge to land be infeasible, a Notice of Intent would be filed with the Central Valley Regional Water Quality Control Board (CVRWQCB) for a low-threat discharge to surface waters (CVRWQCB Order No. R5-2013-0073-01, NPDES No. CAG995002). Proposed project operational activities, including utility yards, may cause polluted storm water runoff into drainages. Pollutants that are associated with equipment, such as lubricants and fuel, could migrate into receiving waters if appropriate management measures are not implemented.

Implementation of 2009 SPSP EIR Mitigation Measures 3.7-1 and 3.7-5 which includes obtaining and complying with the Clean Water Act Section 401 Water Quality Certification requirements, National Pollutant Discharge Elimination System (NPDES) General Permit for Storm Water Discharges, obtaining a dewatering permit, and compliance with Sutter County well design standards. Compliance with these measures would reduce construction and operational water quality impacts to a less than significant level. This impact is adequately addressed in the 2009 SPSP EIR and no further analysis is required. This issue will not be addressed in the Focused Tiered EIR.

b) **Adequately Addressed in 2009 SPSP EIR.** The 2009 SPSP EIR found that net groundwater recharge for the Natomas Basin would be positive with the implementation of the SPSP. Groundwater modeling prepared for the 2009 SPSP EIR found that, deep percolation decreased by 3,793 acre-feet per year (afy) from the existing baseline condition of 37,414 afy of deep percolation, due to conversion of land in the project site from agricultural to urban uses, and an increase in groundwater pumping of 6,859 afy in the project area. However, the proposed project would not result in pumping of groundwater beyond that required to construct the pump stations and limited portions of trenches for the pipelines during construction only. As a result, implementation of the proposed project would not substantially deplete groundwater supplies or interfere substantially with groundwater recharge. This impact is considered to be adequately addressed in the 2009 SPSP EIR and is less than significant. This issue will not be addressed in the Focused Tiered EIR.

c,d,e) **Adequately Addressed in 2009 SPSP EIR.** During construction of the proposed project, the natural drainage pattern of the area would be temporarily disrupted, and soils could be subject to accelerated erosion, with sediments deposited in downstream receiving waters. However, the proposed project area is relatively flat and construction activities would not be anticipated to

substantially alter the existing drainage pattern in a manner that would result in significant erosion or siltation.

The permanent location of pump stations would result in a small increase in impervious surfaces over that which currently exists, thereby increasing the amount of surface runoff and reducing the amount of water infiltrating into the soil. The amount of impervious surfaces created with implementation of proposed project facilities would be minimal because pipelines would be placed in existing roadway alignments, construction-related erosion and sedimentation impacts would be temporary in nature, and the pump stations sites would encompass less than one acre.

The construction and operation of the proposed project would not alter the course of any surface water body and would not contribute substantially to an increase in runoff water quantity or quality. Project pipelines would be constructed underground within existing road rights-of-way; thus, drainage patterns would not be altered by construction, and project pipelines would not generate additional impervious surfaces that would contribute to additional runoff that would lead to flooding. Therefore, construction and operation of the proposed project would not result in impacts related to capacity of existing or planned storm water drainages systems. This impact is considered to be adequately addressed in the 2009 SPSP EIR and is less than significant. This issue will not be addressed in the Focused Tiered EIR.

g,h) **No Impact.** No housing is proposed as part of the proposed project and there are no above-ground structures proposed. Therefore, no housing would be placed in a designated flood hazard zone and no impact would occur. This issue will not be addressed in the Focused Tiered EIR.

i) **Adequately Addressed in 2009 SPSP EIR.** The 2009 SPSP EIR noted that existing flood risk is the result of inadequate levee protection on the east side of the project area. SAFCA has jurisdiction over the levees protecting the project area is currently implementing construction improvements, along with the US Army Corps of Engineers, on the Natomas Levee Improvement Program to provide 1 200-year flood protection to the Natomas Basin, including the project area. With implementation of these improvements it is expected that protection from the 200-year storm event would be provided for the project area when completed. Current levels of protection are to the 100-year flood event. Implementation of 2009 SPSP EIR Mitigation Measures 3.7-2a and 3.7-4a would reduce the potential for increased risk of flooding to a less-than-significant level. Therefore, this impact is adequately addressed in the 2009 SPSP EIR and no further analysis is required. This issue will not be addressed in the Focused Tiered EIR.

j) **No Impact.** The project area is located on and near flat topography remote from major water bodies capable of producing a seiche, tsunamis, or significant mudflows. No impact would occur and this issue will not be addressed in the Focused Tiered EIR.

Summary

2009 SPSP EIR Mitigation Measures 3.7-1, 3.7-2a, 3.7-4a and 3.7-5 would be implemented as part of the proposed project and would reduce impacts hydrology and water quality impacts to a less-than-significant level. The proposed project would not exceed the levels of significance of hydrology and water quality impacts previously addressed in the 2009 SPSP EIR, nor would it introduce any new significant hydrology and water quality impacts that were not previously addressed. This issue will not be evaluated in the Focused Tiered EIR.

References

Sacramento Area Flood Control Agency, 2016. Natomas Levee Improvement Program. Available: http://www.safca.org/Programs_Natomas.html. Accessed on June 17, 2016.

State Water Resources Control Board, 2012. Final 2012 California Integrated Report (Clean Water Act Section 303(d) List / 305(b) Report), 2012. Available: http://www.waterboards.ca.gov/water_issues/programs/tmdl/integrated2012.shtml. Accessed on June 17, 2016.

Sutter County, 2008. Sutter Pointe Specific Plan Project EIR, December 2008.

Land Use and Land Use Planning

Impacts of the proposed project on land use and land planning are evaluated in Section 3.1, page 3.1-17 through 3.1-18 of the 2009 SPSP EIR. The proposed project is within the scope of analysis in the 2009 SPSP EIR. The project would not result in a change in conditions relating to land use and land use planning.

Environmental Setting

The SPSP area is located within the 9,500-acre "Sutter County Industrial-Commercial Reserve" designated in the Sutter County General Plan and within the boundaries of the NBHCP area. Currently, the project area consists predominantly of agriculture, rural and low-density residential, industrial, and roadways, and public easements and rights of way. The SPSP area is primarily in rice production, but portions are used for other agriculture uses, predominantly irrigated and non-irrigated crops. Residences and associated agricultural outbuildings are located along the road in the northern portions of the project area, with low density residential areas along the pipeline alignment within Sacramento County. These existing residences would not be removed as part of development of the proposed project.

On June 30, 2009, the Sutter County Board of Supervisors adopted the SPSP which included the establishment of a mixture of land uses on approximately 7,538 acres including employment centers, several different housing densities, retail, recreational facilities, schools, community services, supporting on- and off-site infrastructure, and roadway improvements. Generally, the SPSP would permit a maximum of 17,500 residential units and up to 49.706 million square feet (sf) of commercial/industrial space. The SPSP also proposes parks, schools (six K–8 and one comprehensive high school), a library, a civic center, other civic buildings and public services, and supporting infrastructure. The 2009 SPSP EIR also included analysis of off-site improvements required for the SPSP, including the proposed project's wastewater conveyance infrastructure.

2009 SPSP EIR Standards of Significance

The 2009 SPSP EIR considers a land use and land use planning impact significant if build out of the SPSP would:

- Physically divide an established community;
- Conflict with any applicable land use plan, policy, or regulation of an agency with jurisdiction over the project adopted for the purpose of avoiding or mitigating an environmental effect; or
- Conflict with any applicable habitat conservation plan or natural community conservation plan.

2009 SPSP EIR Impacts and Mitigation Measures

Impacts of build out of the SPSP on land use and planning were evaluated in Section 3.1 of the 2009 SPSP EIR. As described above, the proposed project is within the scope of the analysis of the 2009 SPSP EIR. No significant or potentially significant land use and planning impacts were identified in the 2009 SPSP

EIR. Because the scope of the proposed project is within that of the SPSP and the 2009 SPSP EIR, no significant impacts or mitigation measures relating to land use and planning are anticipated.

2009 SPSP EIR IMPACTS

Land Use and Planning		Level of Significance Prior to Mitigation	Level of Significance After Mitigation
3.1-1	**Consistency with Sutter County LAFCO Guidelines**. The proposed project would require approval by the Sutter County LAFCO of a reorganization for detachment of its existing CSA and creation of a new CSA, establishment of a sphere of influence coterminous with the boundaries of the project site, and possible eventual incorporation of the project site.	LS	NA
3.1-2:	**Consistency with Sutter County LAFCO and Sacramento LAFCO Guidelines for Service to the Project Site by SRCSD**. Extension of the SRCSD sphere of influence to the project site would require approval by Sacramento LAFCO before SRCSD could provide wastewater service to the proposed project.	LS	NA
3.1-3	**Compatibility with the Sacramento International Airport Comprehensive Airport Land Use Plan**. The Sacramento International Airport CLUP defines compatible land uses within airport safety zones and prohibits new residential development in those areas subject to noise levels of 65-db CNEL or above.	LS	NA
3.1-4	**Conflict with the SACOG Sacramento Region Blueprint.** Implementation of the proposed project would differ somewhat from the SACOG Sacramento Region Preferred Blueprint Scenario.	LS	NA
3.1-5	**Consistency with Measure M**. Implementation of the proposed project would include development of residential uses, commercial/industrial uses, supporting public facilities and services,and infrastructure improvements consistent with the recommendations of Measure M.	LS	NA
3.1-6	**Consistency with Sutter County LAFCO Guidelines**. Development of Phase 1 and Phase A would require approval by the Sutter County LAFCO of a reorganization for detachment of its existing CSA and creation of a new CSA, establishment of a sphere of influence coterminous with the boundaries of the project site, and possible eventual incorporation of the project site.	LS	NA
3.1-7	**Consistency with Sutter County LAFCO and Sacramento LAFCO Guidelines for Service to Attachment the Project Site by SRCSD**. Extension of the SRCSD service area sphere of influence to include Phase 1 and Phase A would require approval by Sacramento LAFCO before SRCSD could provide wastewater service to the proposed project.	LS	NA
3.1-8	**Compatibility with the Sacramento International Airport Comprehensive Airport Land Use Plan**. The Sacramento International Airport CLUP defines compatible land uses within airport safety zones and prohibits new residential development in those areas subject to noise levels of 65-dB CNEL or above.	LS	NA
3.1-9	**Conflict with the SACOG Sacramento Region Blueprint**. Implementation of Phase 1 and Phase A would differ somewhat from the SACOG Sacramento Region Preferred Blueprint Scenario.	LS	NA
3.1-10	**Consistency with Measure M**. Implementation of Phase 1 and Phase A would include development of residential uses, commercial/industrial uses, supporting public facilities and services,and infrastructure improvements consistent with the recommendations of Measure M.	LS	NA

LS=Less than Significant, S=Significant, PS=Potentially Significant, SU=Significant and Unavoidable, NA = Not Applicable

Environmental Checklist and Discussion

Issues (and Supporting Information Sources):		Potentially Significant Impact	Less Than Significant Impact	No Impact	Impact Adequately Addressed in 2009 SPSP EIR
10.	**LAND USE AND LAND USE PLANNING— Would the project:**				
a)	Physically divide an established community?	☐	☐	☒	☐
b)	Conflict with any applicable land use plan, policy, or regulation of an agency with jurisdiction over the project (including, but not limited to the general plan, specific plan, local coastal program, or zoning ordinance) adopted for the purpose of avoiding or mitigating an environmental effect?	☐	☐	☒	☐
c)	Conflict with any applicable habitat conservation plan or natural community conservation plan?	☐	☐	☐	☒

Discussion

a) **No Impact.** No existing comminutes are located within the project site. Therefore, the proposed project would not physically divide and established community and no impact would occur. This issue will not be addressed in the Focused Tiered EIR.

b) **No Impact.** Construction of the proposed project would not conflict with existing land use plans or policies. Construction and operation of proposed project wastewater conveyance infrastructure would support the planned development of the SPSP project area which is consistent with the Sutter County General Plan, the recently approved SPSP, and with voter approved Measure M, all of which call for planned development in south Sutter County and support the development of public services and utilities to support this growth. Further, the proposed pipeline within Sacramento County would be located within existing roadway or utility easements and would not affect land uses. Therefore, no impact would occur. This issue will not be addressed in the Focused Tiered EIR.

c) **Adequately Addressed in the 2009 SPSP EIR.** As described in the biological resources discussion above, the NBHCP was developed to provide and implement a multispecies conservation program to minimize and mitigate impacts of planned urban development, including the SPSP. The boundaries of the SPSP project area, including portions of the proposed project, are the same as the boundaries of the NBHCP south Sutter permit area. Thus, mitigation measures specific to the ITP issued as part of the NBHCP will apply to that portion of the proposed project within the boundaries of the NBHCP. The proposed project is consistent with the NBHCP, and this issue was adequately addressed in the 2009 SPSP EIR. This issue will not be addressed in the Focused Tiered EIR.

Summary

No Mitigation Measures from the 2009 SPSP EIR are relevant to the proposed project for land use and land planning. The proposed project would not exceed the levels of significance relating to land use and land planning previously addressed in the 2009 SPSP EIR, nor would it introduce any new significant impacts that were not previously addressed. This issue will not be evaluated in the Focused Tiered EIR.

References

Sutter County, 2008. Sutter Pointe Specific Plan Project EIR, December 2008.

Mineral Resources

Issues (and Supporting Information Sources):	*Potentially Significant Impact*	*Less Than Significant Impact*	*No Impact*	*Impact Addressed in 2009 SPSP EIR*
11. MINERAL RESOURCES—Would the project:				
a) Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state?	☐	☐	☒	☐
b) Result in the loss of availability of a locally important mineral resource recovery site delineated on a local general plan, specific plan or other land use plan?	☐	☐	☒	☐

Discussion

a,b) **No Impact.** As described on page 1-9 of the 2009 SPSP EIR, pursuant to the CEQA checklist, only the potential for project impacts on mineral resources is not discussed in the 2009 SPSP EIR. The project site was not identified as an area containing known mineral resources that would be of value to the region. Therefore, this topic was not addressed in the 2009 SPSP EIR. No impact on mineral resources is expected. This issue will not be evaluated in the Focused Tiered EIR.

References

Sutter County, 2008. Sutter Pointe Specific Plan Project EIR, December 2008.

Noise

Impacts of the proposed project relating to noise are evaluated in Section 3.5, page 3.5-14 through 3.5-23 of the 2009 SPSP EIR. The proposed project is within the scope of analysis in the 2009 SPSP EIR. The project would not result in a change in conditions relating to noise and would have no new adverse effects.

Environmental Setting

The existing ambient noise environment in the project area is defined primarily by traffic on SR 99 and local roadways, frequent Union Pacific Railroad (UPRR) operations, seasonal agricultural activities, local industry, and aircraft operations associated with Sacramento International Airport.

Existing land uses in the project area are primarily agricultural, rural and low-density residential, and industrial. However, the project proposes conversion of agricultural areas into residential, employment, and community facility uses. As a result, noise generated by on-site agricultural uses would ultimately be phased out. However, agricultural activities will likely continue to occur on neighboring properties as well as on-site properties not involved in the current phase of development.

2009 SPSP EIR Standards of Significance

The 2009 SPSP EIR considers a noise impact significant if build out of the SPSP would result in:

- Exposure of persons to or generation of noise levels in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies.
- Exposure of persons to or generation of excessive groundborne vibration or groundborne noise levels. As noted in Table 3.5-13, a threshold of 0.1 in/sec PPV represents the onset of annoyance and is, therefore, used as the significance threshold in this analysis.
- A substantial permanent increase in ambient noise levels in the project vicinity above levels existing without the project. The criteria for assessing the significance of project-related traffic noise level increases are provided above in Table 3.5-12. Table 3.5-12 identifies project-related noise level increase thresholds of 1.5, 3 and 5 dB as being significant where existing, pre-project, noise levels are greater than 65 dB Ldn, between 60 and 65 dB Ldn, and less than 60 dB Ldn, respectively.
- A substantial temporary or periodic increase in ambient noise levels in the project vicinity above levels existing without the project. Temporary increases are normally associated with construction related noise, and such activities are normally exempt, and are, thus, less than significant provided they occur during daytime hours.
- Exposure of people residing or working in the area to excessive noise levels from railroad and aircraft, including single event noise incidents that would result in speech interference or disturb sleep. The thresholds used herein for speech and sleep interference are 60 dB SEL and 70 dB SEL, respectively.
- Exposure of people attending schools or working in schools to excessive noise levels from railroad and aircraft, including single event noise incidents that would result in speech interference. The County standards applied to school uses is 45 dB Leq within classrooms (Table 3.5-4) and the recommended threshold used herein for speech interference is 60 dB SEL.

2009 SPSP EIR Impacts and Mitigation Measures

Impacts of the build out of the SPSP on noise were evaluated in Section 3.5 of the 2009 SPSP EIR. As described above, the proposed project is within the scope of the analysis of the 2009 SPSP EIR. Significant and potentially significant noise related impacts identified in the 2009 SPSP EIR that are relevant to the proposed project are presented below with their corresponding levels of significance before and after application of mitigation measures identified in the 2009 SPSP EIR.

2009 SPSP EIR IMPACTS

Noise		Level of Significance Prior to Mitigation	Level of Significance After Mitigation
3.5-5	**Noise Impacts Associated with Project Construction Activities.**	S	LS
3.5-7	**Exposure of Noise Sensitive Land Uses on the Project Site to noise Generated by New Commercial, Industrial, Recreation, School, Utilities, and Public Facility Uses.**	PS	LS
3.5-8	**Exposure of Noise Sensitive Land Uses on the Project Site to Noise Generated by Existing Industrial Uses with the Project Site.**	PS	LS
3.5-9	**Increase in Traffic Noise Levels Due to Project Buildout.**	S	SU

LS=Less than Significant, S=Significant, PS=Potentially Significant, SU=Significant and Unavoidable, NA = Not Applicable

The following mitigation measures from the 2009 SPSP EIR were adopted for development in the SPSP Area by the Sutter County Board of Supervisors and they would mitigate noise impacts associated with implementation of the proposed project. The County would ensure that construction and operation of the proposed project would be implemented consistent with the mitigation, monitoring and enforcement requirements for the 2009 SPSP EIR MMRP.

2009 SPSP EIR MITIGATION MEASURES

Noise	
3.5-5a	Construction activities taking place in Sutter County shall be restricted to 7:00 a.m. to 7:00 p.m. Monday through Friday, and 8:00 a.m. to 5:00 p.m. on Saturdays, Sundays, and Federal Holidays.
3.5-7a	Require acoustical analyses for new on-site commercial, industrial, recreation, school, utilities, and public facility uses constructed within Sutter County determined to have the potential to exceed applicable noise standards.

Environmental Checklist and Discussion

Issues (and Supporting Information Sources):		*Potentially Significant Impact*	*Less Than Significant Impact*	*No Impact*	*Impact Addressed in 2009 SPSP EIR*
12.	**NOISE—Would the project:**				
a)	Result in exposure of persons to, or generation of, noise levels in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies?	☒	☐	☐	☐
b)	Result in exposure of persons to, or generation of, excessive groundborne vibration or groundborne noise levels?	☒	☐	☐	☐
c)	Result in a substantial permanent increase in ambient noise levels in the project vicinity above levels existing without the project?	☒	☐	☐	☐
d)	Result in a substantial temporary or periodic increase in ambient noise levels in the project vicinity above levels existing without the project?	☒	☐	☐	☐
e)	For a project located within an airport land use plan area, or, where such a plan has not been adopted, in an area within two miles of a public airport or public use airport, would the project expose people residing or working in the area to excessive noise levels?	☐	☒	☐	☐
f)	For a project located in the vicinity of a private airstrip, would the project expose people residing or working in the project area to excessive noise levels?	☐	☒	☐	☐

Discussion

a,c,d) **Potentially Significant Impact.** The 2009 SPSP EIR found that noise associated with the use of large construction equipment such as drill rigs, excavators, graders, and bulldozers would reach 88 dB, which is higher than the generally acceptable noise level for industrial land use of 70 dB. Construction of the proposed project would result in the use of similar construction equipment as identified in the 2009 SPSP EIR, so it is assumed that project related construction noise would be similar to conditions described in the 2009 SPSP EIR. Operational noise levels from proposed project wastewater conveyance facilities would not generate noise levels in excess of established

standards because they would be underground where located near sensitive receptors. Although implementation of 2009 SPSP EIR Mitigation Measures 3.5-5a and 3.5-7a would reduce potential impacts associated with temporary construction noise and operational noise to a SPSP area, the 2009 SPSP EIR did not analyze noise impacts from construction of the proposed project on adjacent sensitive receptors at a project level. Therefore, impacts from noise would be potentially significant and this issue will be addressed in the Focused Tiered EIR.

b) **Potentially Significant Impact.** Given the rural nature and limited number sensitive receptors in the project area, typical vibration associated with construction activities would be temporary. In addition, the project does not require impact pile driving or other equipment that would generate excessive groundborne vibration beyond standard construction practices. Although implementation of 2009 SPSP EIR Mitigation Measures 3.5-5a and 3.5-7a would reduce potential impacts associated with temporary construction noise and operational noise to a SPSP area, the 2009 SPSP EIR did not analyze noise impacts from construction of the proposed project on adjacent sensitive receptors at a project level. Therefore, impacts from noise would be potentially significant and this issue will be addressed in the Focused Tiered EIR.

e,f) **Less Than Significant Impact.** There are five private airstrips and one public airport in the project area. Aircraft noise exposure to the limited number of staff working on the construction and operation of the proposed project would be temporary and intermittent. Further the proposed project is located within areas where people live and work permanently exposed to aircraft noise. Based on the locations of the public and private airstrips, impacts would be less than significant. This issue will not be addressed in the Focused Tiered EIR.

Summary

2009 SPSP EIR Mitigation Measures 3.5-5a and 3.5-7a would be implemented as part of the proposed project and would reduce noise impacts to a less-than-significant level. The proposed project would not exceed the levels of significance for noise impacts previously addressed in the 2009 SPSP EIR, nor would it introduce any new significant noise impacts that were not previously addressed. This issue will not be evaluated in the Focused Tiered EIR.

References

Sutter County, 2008. Sutter Pointe Specific Plan Project EIR, December 2008.

Population and Housing

Section 3.2 of the 2009 SPSP EIR addresses the population and housing effects of growth under build out of the SPSP. The following discussion summarizes information presented in Section 3.2, page 3.2-3 through 3.2-5 of the 2009 SPSP EIR.

Environmental Setting

The SPSP includes new housing and businesses that would result in direct increases in population in the SPSP area in Sutter County over the 20- to 30-year buildout period. It is anticipated that the residential land uses would develop at a relatively even rate, estimated to be approximately 18 to 20 years. Approximately 5% of the planned units would be designated for moderate-, low-, and very low-income households. This housing would include a mix of purchase housing affordable to moderate-income households and rental housing affordable to low- and very low-income households.

2009 SPSP EIR Standards of Significance

The 2009 SPSP EIR considers an impact to population and house significant if build out of the SPSP would:

- Induce substantial population growth in an area, either directly (by proposed new homes and businesses) or indirectly (through the extension of roads or other infrastructure);
- Generate a substantial demand for new housing, the construction of which could cause significant environmental impacts;
- Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere; or
- Result in employment or housing conditions inconsistent with Sutter County's affordable housing goals, policies, or objectives in the General Plan to the extent that any such inconsistency will foreseeably result in adverse changes in the physical environment.

2009 SPSP EIR Impacts and Mitigation Measures

Impacts of build out of the SPSP on population and housing were evaluated in Section 3.2 of the 2009 SPSP EIR. As described above, the proposed project is within the scope of the analysis of the 2009 SPSP EIR. No significant or potentially significant population and housing impacts or mitigation measures were identified in the 2009 SPSP EIR. Because the scope of the proposed project is within that of the SPSP and the 2009 SPSP EIR, no significant impacts relating to population and housing are anticipated.

2009 SPSP EIR IMPACTS

Population and Housing		Level of Significance Prior to Mitigation	Level of Significance After Mitigation
3.2-1	**Temporary Increase in Employment and Subsequent Housing Demand during Construction**. Implementation of the proposed project would generate a temporary increase in employment and subsequent housing demand in Sutter County from construction jobs.	LS	NA
3.2-2	**Permanent Increase in Population Growth**. Implementation of the proposed project would result in the development of new residential dwelling units, which would cause a direct long-term increase in population.	LS	NA
3.2-4	**Temporary Increase in Employment and Subsequent Housing Demand during Construction**. Implementation of the proposed project would generate a temporary increase in employment and subsequent housing demand in Sutter County from construction jobs.	LS	NA
3.2-5	**Permanent Increase in Population Growth**. Implementation of the proposed project would result in the development of new residential dwelling units, which would cause a direct increase in population.	LS	NA
3.2-6	**Consistency with Sutter County Affordable Housing Goals and Policies**. Implementation of the proposed project would include development of an affordable housing strategy consistent with the adopted Sutter County General Plan Housing Element and Sutter County's Affordable Housing Program Ordinance.	LS	NA

LS=Less than Significant, S=Significant, PS=Potentially Significant, SU=Significant and Unavoidable, NA = Not Applicable

Environmental Checklist and Discussion

Issues (and Supporting Information Sources):	*Potentially Significant Impact*	*Less Than Significant Impact*	*No Impact*	*Impact Adequately Addressed in 2009 SPSP EIR*
13. POPULATION AND HOUSING— Would the project:				
a) Induce substantial population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)?	☐	☐	☐	☒
b) Displace substantial numbers of existing housing units, necessitating the construction of replacement housing elsewhere?	☐	☒	☐	☐
c) Displace substantial numbers of people, necessitating the construction of replacement housing elsewhere?	☐	☒	☐	☐

Discussion

a) **Adequately Addressed in the 2009 SPSP EIR.** The proposed project would construct wastewater conveyance infrastructure that would support planned growth, consistent with the Sutter County General Plan and population growth analyzed and approved of in the 2009 SPSP EIR. Construction and operation of the proposed project is not anticipated to induce direct or indirect population growth outside that already planned by the SPSP and evaluated in the 2009 SPSP EIR. While growth related impacts of the proposed project were addressed in the 2009 SPSP EIR, a discussion of impacts related to growth inducement will be discussed further in the Focused Tiered EIR.

b,c) **No Impact.** Construction and operation of the proposed project would occur within areas designated for infrastructure and would not displace existing housing or population. There would be no impact and this issue will not be addressed in the Focused Tiered EIR.

Summary

No Mitigation Measures from the 2009 SPSP EIR are relevant to the proposed project for population and housing. The proposed project would not exceed the levels of significance relating to population and housing previously addressed in the 2009 SPSP EIR, nor would it introduce any new significant impacts that were not previously addressed. While growth related impacts of the proposed project were addressed in the 2009 SPSP EIR, a discussion of impacts related to growth inducement will be included in the Focused Tiered EIR.

References

Sutter County, 2008. Sutter Pointe Specific Plan Project EIR, December 2008.

Public Services

Impacts of the proposed project on public services were evaluated in Section 3.8, page 3.8-4 through 3.8-9 of the 2009 SPSP EIR. The proposed project is within the scope of analysis in the 2009 SPSP EIR. The

project would not result in a change in conditions relating to public services and would have no effect on these resources.

Environmental Setting

The Sutter County Sheriff's Department provides police protection services in unincorporated Sutter County. The California Highway Patrol provides traffic enforcement on SR 99. Fire protection and emergency services for the project area are provided by Sutter County Fire (County Service Area). The project area is in the Marcum-Illinois and Pleasant Grove Union School Districts. No other public services (for example, schools and parks) serve the SPSP area.

2009 SPSP EIR Standards of Significance

The 2009 SPSP EIR considers a public service impact significant if build out of the SPSP would result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities or the need for new or physically altered governmental facilities, the construction of which could cause significant environmental impacts, to maintain acceptable service ratios, response times, or other performance objectives for any of the following public services:

- fire protection services,
- law enforcement services,
- school services,
- library services,
- judicial services,
- public health services,
- mental health services, and
- social services.

2009 SPSP EIR Impacts and Mitigation Measures

Impacts of the build out of the SPSP on public services were evaluated in Section 3.8 of the 2009 SPSP EIR. As described above, the proposed project is within the scope of the analysis of the 2009 SPSP EIR. Significant and potentially significant public services impacts identified in the 2009 SPSP EIR that are relevant to the proposed project are presented below with their corresponding levels of significance before and after application of mitigation measures identified in the 2009 SPSP EIR.

2009 SPSP EIR IMPACTS

	Public Services	Level of Significance Prior to Mitigation	Level of Significance After Mitigation
3.8-1	**Temporary Obstruction of Roadways during Construction**. Project implementation could obstruct roadways in the project vicinity during construction, potentially obstructing or slowing emergency vehicles attempting to access the area.	S	LS

LS=Less than Significant, S=Significant, PS=Potentially Significant, SU=Significant and Unavoidable, NA = Not Applicable

The following mitigation measures from the 2009 SPSP EIR were adopted for development in the SPSP Area by the Sutter County Board of Supervisors and they would mitigate public services impacts associated with implementation of the proposed project. The County would ensure that construction and operation of the proposed project would be implemented consistent with the mitigation, monitoring and enforcement requirements for the 2009 SPSP EIR MMRP.

2009 SPSP EIR MITIGATION MEASURES

Public Services	
3.8-1	Prepare and Implement Construction Traffic Control Plans.

Environmental Checklist and Discussion

Issues (and Supporting Information Sources):	*Potentially Significant Impact*	*Less Than Significant Impact*	*No Impact*	*Impact Adequately Addressed in 2009 SPSP EIR*
14. PUBLIC SERVICES— Would the project:				
a) Result in substantial adverse physical impacts associated with the provision of, or the need for, new or physically altered governmental facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times, or other performance objectives for any of the following public services:				
i) Fire protection?	☐	☐	☐	☒
ii) Police protection?	☐	☐	☐	☒
iii) Schools?	☐	☐	☐	☒
iv) Parks?	☐	☐	☐	☒
v) Other public facilities?	☐	☐	☐	☒

Discussion

a.i - v) **Adequately Addressed in the 2009 SPSP EIR.** During construction of the proposed project, specifically installation of underground wastewater conveyance pumps and pipelines, it could be necessary to implement full or partial lane closures that could affect police and fire response to surrounding areas. Implementation of 2009 SPSP EIR Mitigation Measure 3.8-1 would reduce this impact to a less-than-significant level. Implementation of the proposed project would not contribute to reduced levels of service or require new or altered facilities such as fire, police, schools or parks not already evaluated in the 2009 SPSP EIR. This impact is adequately addressed in the 2009 SPSP EIR and no further analysis is required. This issue will not be addressed in the Focused Tiered EIR.

Summary

2009 SPSP EIR Mitigation Measure 3.8-1 would be implemented as part of the proposed project and would reduce public services impacts to a less-than-significant level. The proposed project would not exceed the levels of significance of public services impacts previously addressed in the 2009 SPSP EIR, nor would it

introduce any new public services impacts that were not previously addressed. This issue will not be evaluated in the Focused Tiered EIR.

References

Sutter County, 2008. Sutter Pointe Specific Plan Project EIR, December 2008.

Recreation

Impacts on recreation were evaluated in Section 3.14, page 3.14-2 through 3.14-5 of the 2009 SPSP EIR. The proposed project is within the scope of analysis in the 2009 SPSP EIR. The project would not result in a change in conditions relating to recreation and would have no effect on this resource.

Environmental Setting

No local or regional parks or bikeways are located in the SPSP area, which primarily consists of undeveloped land that supports agricultural land uses, as well as some industrial lands, or on the proposed wastewater conveyance pipeline route within roadways.

2009 SPSP EIR Standards of Significance

The 2009 SPSP EIR considers an impact to recreational resources significant if build out of the SPSP would:

- Increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated; or
- Include recreational facilities or require the construction or expansion of recreational facilities that might have an adverse physical effect on the environment.

2009 SPSP EIR Impacts and Mitigation Measures

Impacts of build out of the SPSP on recreation were evaluated in Section 3.14 of the 2009 SPSP EIR. As described above, the proposed project is within the scope of the analysis of the 2009 SPSP EIR. Significant and potentially significant impacts identified in the 2009 SPSP EIR that are relevant to the proposed project are presented below with their corresponding levels of significance before and after application of mitigation measures identified in the 2009 SPSP EIR.

2009 SPSP EIR IMPACTS

Recreation		Level of Significance Prior to Mitigation	Level of Significance After Mitigation
3.14-2	**Increased Use and Potential Physical Deterioration of Existing Off-Site Local or Regional Park Facilities**. Project implementation would result in a large number of new residents, which would increase the use and cause the potential physical deterioration of existing off-site local and regional park facilities.	LS	NA

LS=Less than Significant, S=Significant, PS=Potentially Significant, SU=Significant and Unavoidable, NA = Not Applicable

No Mitigation Measures from the 2009 SPSP EIR are relevant to the proposed project for recreation.

Environmental Checklist and Discussion

Issues (and Supporting Information Sources):	*Potentially Significant Impact*	*Less Than Significant Impact*	*No Impact*	*Impact Adequately Addressed in 2009 SPSP EIR*
15. RECREATION—Would the project:				
a) Increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facilities would occur or be accelerated?	☐	☐	☐	☒
b) Include recreational facilities or require the construction or expansion of recreational facilities that might have an adverse physical effect on the environment?	☐	☐	☐	☒

Discussion

a,b) **Adequately Addressed in the 2009 SPSP EIR.** The proposed project would construct and operate a wastewater conveyance system to support development proposed under the SPSP. Implementation of the proposed project would not contribute to an increased use in parks or other recreational facilities or require the construction or expansion of new recreational facilities beyond that described and evaluated in the 2009 SPSP EIR. This impact is considered to be adequately addressed in the 2009 SPSP EIR and will not be evaluated in the Focused Tiered EIR.

Summary

No Mitigation Measures from the 2009 SPSP EIR are relevant to the proposed project for recreation. The proposed project would not exceed the levels of significance relating to recreation previously addressed in the 2009 SPSP EIR, nor would it introduce any new significant impacts that were not previously addressed. This issue will not be evaluated in the Focused Tiered EIR.

References

Sutter County, 2008. Sutter Pointe Specific Plan Project EIR, December 2008.

Transportation and Traffic

Impacts of the proposed project on transportation and traffic were evaluated in Section 3.3, page 3.3-5 through 3.3-15 of the 2009 SPSP EIR. The proposed project is within the scope of analysis in the 2009 SPSP EIR. The project would not result in a change in conditions relating to transportation and traffic and would have no new adverse effects on these resources.

Environmental Setting

The transportation system in south Sutter County and north Sacramento County is focused around the roadway network. Most travel in the counties is done in automobiles because the low-density development patterns have limited the feasibility of facilities or services related to transit, bicycle, or pedestrian use.

According to the 2000 U.S. Census, approximately 93% of all working County residents traveled from home to work by automobile. Although automobile travel is the primary function for the roadway network, the network also serves, where allowed, trucks, buses, bicycles, and pedestrians. The regional roadway network in south Sutter County and north Sacramento County includes the following major roadways:

State Highways

- SR 70/99 – SR 70/99 is a north-south state route that connects the core of the Sacramento region with the cities of Marysville (by SR 70) and Yuba City (by SR 99).

Major County Roads

- **Sankey Road** is an east-west rural collector east of SR 70/99 to Pleasant Grove Road and is a dirt road to the west. Sankey Road intersects SR 70/99 with an at-grade side-street stop-controlled intersection. Sankey Road has an at-grade crossing of the Union Pacific Railroad where it crosses between Natomas Road and Pleasant Grove Road.

- **Riego Road/Baseline Road** is an east-west rural arterial road that links SR 70/99 with the City of Roseville. Riego Road is two lanes through the project with an at-grade traffic signal controlled intersection at SR 70/99. Riego Road becomes Baseline Road at the Sutter County/Placer County line near the Pleasant Grove Road intersection. Baseline Road intersects Watt Avenue and extends east to the City of Roseville. Riego Road has an at-grade crossing of the Union Pacific Railroad where it crosses between Natomas Road and Pleasant Grove Road (N). Riego Road is designated STAA (Surface Transportation Assistance Act, 1992) truck terminal access route between SR 70/99 and Pacific Avenue.

- **Pleasant Grove Road** is a north-south rural two-lane road that links Riego Road to the north with the Elverta and Rio Linda communities in north Sacramento County to the south.

- **Rio Linda Boulevard/Elwyn Avenue** is a north-south two-lane rural road that starts in the north at Pleasant Grove Road and links with Elverta Road to the south. This road serves the rural and low-density communities in the north Sacramento County towns of Elverta and Rio Linda.

- **Power Line Road** is a north-south two-lane road that functions as a rural collector, although it is not defined in the Sutter County General Plan. Power Line Road runs from just north of Riego Road south into Sacramento County and has a two-lane grade-separated overcrossing of I-5. Power Line Road has stop controlled intersections at Riego Road and Elverta Road.

- **Pacific Avenue** is a north-south two-lane road that functions as a rural collector, although it is not defined in the Sutter County General Plan. Pacific Avenue connects Sankey Road and Riego Road and serves industrial and warehousing land uses.

- **Elverta Road** is a two-lane east-west arterial from Garden Highway to Watt Avenue. Segments of Elverta Road (east of E. Levee Road) have been widened along improved frontages but have not been striped. Elverta Road intersects SR 70/99 at an at-grade traffic signal controlled intersection. The three-mile segment of Elverta Road between SR 70/99 and E. Levee Road has high access control. Elverta Road serves primarily residential land uses.

- **Elkhorn Boulevard** is an east-west roadway continuing from Power Line Road west of SR 70/99 and extending east into Sacramento County through the Rio Linda and Antelope communities to I-80, where it becomes Greenback Lane. Elkhorn Boulevard is a two-lane roadway within the study area and serves the residential uses in the City of Sacramento and commute trips between Sacramento County and SR 70/99.

2009 SPSP EIR Standards of Significance

The 2009 SPSP EIR considered a transportation and traffic impact significant if build out of the SPSP would:

- Cause the existing or cumulative no project level of service for study locations to deteriorate from LOS D (or better) to LOS E (or worse).
- Exacerbate the existing or cumulative no project LOS E (or worse) conditions for study locations.

Caltrans Facilities

- Cause the existing or cumulative no project level of service for study locations to deteriorate from LOS E (or better) to LOS F.
- Exacerbate the existing or cumulative no project LOS F (or worse) conditions for study locations by adding traffic to a freeway/highway segment, ramp terminal intersection, or ramp junction influence area.

Transit System

- Create demand for public transit services or facilities greater than there is adequate capacity to accommodate, disrupt existing or interfere with planned transit services or facilities, and
- Create an inconsistency with the transit policies or standards of plans adopted by jurisdictions within the study area.

Bicycle and Pedestrian System

- Disrupt existing or interfere with existing or planned bicycle or pedestrian facilities that would discourage their use and/or create an inconsistency with the bikeway or pedestrian policies or standards of plans adopted by the jurisdictions within the study area.

Aviation

- Result in a change in air traffic patterns, including either an increase in traffic levels or a change in location that results in substantial safety risk.

2009 SPSP EIR Impacts and Mitigation Measures

The discussion relating to transportation and traffic provided in the 2009 SPSP EIR is primarily focused on trips relating to build out of the specific plan and the increase in traffic associated with residential, commercial, and industrial development within the plan area. Discussion of construction related traffic and transportation related impacts were addressed in Section 3.8 – Public Services of the 2009 SPSP EIR. Please refer to the public services discussion of this environmental checklist for transportation and traffic related impacts and mitigation measures. Operational traffic associated with the proposed project would be limited to worker trips for infrequent operation and maintenance related trips to various project facilities. As a result, the impacts of the proposed project related to transportation and traffic would be limited to the construction phase.

2009 SPSP EIR IMPACTS

	Transportation and Traffic	Level of Significance Prior to Mitigation	Level of Significance After Mitigation
3.3-1	**Unacceptable Operations on the Regional Roadway Network.** The proposed project would contribute to traffic volumes that exceed the capacity of the regional roadway network under existing conditions and cumulative conditions.	S	SU
3.3-2	**Unacceptable Operations on Sutter County Roadways.** The proposed project would increase daily traffic volumes using Sutter County roadway segments, resulting in unacceptable LOS conditions under existing plus project conditions.	S	SU
3.3-5	**Unacceptable Operations on Caltrans Roadways.** The proposed project would increase daily traffic volumes using Caltrans roadway segments, exacerbating unacceptable LOS conditions under existing plus project conditions.	S	SU
3.3-6	**Unacceptable Operations at Sutter County Intersections.** The proposed project would increase peak hour traffic volumes using Sutter County intersections, resulting in unacceptable LOS conditions under existing plus project conditions.	S	SU
3.3-9	**Unacceptable Operations on Caltrans Facilities.** The proposed project would increase peak hour traffic volumes using Caltrans facilities, resulting in unacceptable LOS conditions under existing plus project conditions.	S	SU

LS=Less than Significant, S=Significant, PS=Potentially Significant, SU=Significant and Unavoidable, NA = Not Applicable

The following Public Services mitigation measures from the 2009 SPSP EIR were adopted for development in the SPSP Area by the Sutter County Board of Supervisors and they would mitigate transportation and traffic impacts associated with implementation of the proposed project. The County would ensure that construction and operation of the proposed project would be implemented consistent with the mitigation, monitoring and enforcement requirements for the 2009 SPSP EIR MMRP.

2009 SPSP EIR MITIGATION MEASURES

	Public Services
3.8-1	Prepare and Implement Construction Traffic Control Plans.

Environmental Checklist and Discussion

Issues (and Supporting Information Sources):	*Potentially Significant Impact*	*Less Than Significant Impact*	*No Impact*	*Impact Adequately Addressed in 2009 SPSP EIR*
16. TRANSPORTATION AND TRAFFIC— Would the project:				
a) Conflict with an applicable plan, ordinance or policy establishing measures of effectiveness for the performance of the circulation system, taking into account all modes of transportation including mass transit and non-motorized travel and relevant components of the circulation system, including but not limited to intersections, streets, highways and freeways, pedestrian and bicycle paths, and mass transit?	☐	☐	☐	☒
b) Conflict with an applicable congestion management program, including, but not limited to level of service standards and travel demand measures, or other standards established by the county congestion management agency for designated roads or highways?	☐	☐	☐	☒
c) Result in a change in air traffic patterns, including either an increase in traffic levels or a change in location, that results in substantial safety risks?	☐	☐	☒	☐
d) Substantially increase hazards due to a design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?	☐	☐	☒	☐
e) Result in inadequate emergency access?	☐	☐	☐	☒
f) Conflict with adopted policies, plans, or programs regarding public transit, bicycle, or pedestrian facilities, or otherwise decrease the performance or safety of such facilities?	☐	☐	☐	☒

Discussion

a,b) **Adequately Addressed in the 2009 SPSP EIR.** Construction of the proposed project could result in temporary traffic increases due to full or partial lane closures during the installation of wastewater conveyance pipelines and from increased construction traffic traveling in the project area. This could affect traffic flow, and have the potential for level of service degradation during construction of project facilities in roadways. Implementation of 2009 SPSP EIR Mitigation Measure 3.8-1 would reduce potential traffic conflicts during project construction to a less-than-significant level by implementation of a traffic control plan to maintain access and road safety at all times during construction. Therefore, this impact is adequately addressed in the 2009 SPSP EIR and no further analysis is required. This issue will not be addressed in the Focused Tiered EIR.

Operational traffic would be limited to infrequent worker trips related to operation and maintenance of project related facilities within the project area. These trips would be infrequent and irregular, would not always occur during peak hours, and would not be anticipated to exceed the capacity of regional and/or local roadways resulting in level of service violations. Therefore, increased vehicle trips associated with operation of the proposed project would be less than significant and this issue will not be addressed in the Focused Tiered EIR.

c) **No Impact.** The proposed project would not change air traffic patterns, increase air traffic levels or result in a change in location that would result in substantial safety risks. No impact would occur. This issue will not be addressed in the Focused Tiered EIR.

d) **No Impact.** Construction of the proposed project would result in underground infrastructure within existing and planned roadways. Construction of the project facilities would not include or exacerbate dangerous design features or incompatible uses. No impact would occur. This issue will not be addressed in the Focused Tiered EIR.

e) **Adequately Addressed in the 2009 SPSP EIR.** Construction of the proposed project within existing and planned roadway rights-of-way could affect emergency access and response. Implementation of 2009 SPSP EIR Mitigation Measure 3.8-1 would reduce this impact to a less-than-significant level by implementation of a traffic safety plan and maintaining access at all times along roadways. Therefore, this impact is adequately addressed in the 2009 SPSP EIR and no further analysis is required. This issue will not be addressed in the Focused Tiered EIR.

f) **Adequately Addressed in the 2009 SPSP EIR.** The proposed project is the construction and operation of a wastewater conveyance system to support development proposed under the SPSP. Implementation of 2009 SPSP EIR Mitigation Measure 3.8-1 would reduce this impact to a less-than-significant level by implementation of a traffic safety plan and maintaining access at all times along roadways. Therefore, this impact is adequately addressed in the 2009 SPSP EIR and no further analysis is required. This issue will not be addressed in the Focused Tiered EIR.

Summary

2009 SPSP EIR Mitigation Measure 3.8-1would be implemented as part of the proposed project and would reduce transportation and traffic related impacts to a less-than-significant level. The proposed project would not exceed the levels of significance for transportation and traffic related impacts previously addressed in the 2009 SPSP EIR, nor would it introduce any new significant transportation and traffic related impacts that were not previously addressed. This issue will not be evaluated in the Focused Tiered EIR.

References

Sutter County, 2008. Sutter Pointe Specific Plan Project EIR, December 2008.

Utilities and Service Systems

Impacts of the proposed project on utilities and services systems, including wastewater, were evaluated in Section 3.9, page 3.9-3 through 3.9-13 and Section 3.10, page 3.10-4 through 3.10-10 of the 2009 SPSP EIR. The proposed project is within the scope of analysis in the 2009 SPSP EIR. The project would not result in a change in conditions relating to utilities and services systems and water supply and would have no new adverse effects on these resources.

Environmental Setting

The provision of all new or physically altered utilities and service systems intended to meet the increased demand for proposed growth under the SPSP would ultimately occur on-site. Facilities such as drainage, water supply, and water facilities would be developed and constructed the SPSP site or connect with planned facilities off-site.

2009 SPSP EIR Standards of Significance

The 2009 SPSP EIR considers an impact to utilities and services systems significant if build out of the SPSP would:

- Create demand for electrical or natural gas service that is substantial in relation to the existing demands;
- Exceed wastewater treatment requirements of the applicable RWQCB;
- Require or result in the construction of new wastewater treatment facilities or expansion of existing facilities, the construction of which could cause significant environmental effects;
- Result in a determination by the wastewater treatment provider that serves or may serve the project that it has inadequate capacity to serve the project's projected demand in addition to the provider's existing commitments;
- Generate solid waste beyond the capacity of existing landfills;
- Violate federal, state, or local statutes and regulations related to solid waste; or
- Result in inefficient, wasteful, and unnecessary consumption of energy (based on Appendix F of the State CEQA Guidelines).
- Require or result in the construction of new water treatment facilities or expansion of existing facilities, the construction of which could cause significant environmental effects; or
- Have insufficient water supplies available to serve the project from existing or permitted entitlements and resources, or require new or expanded entitlements.

2009 SPSP EIR Impacts and Mitigation Measures

Impacts of the build out of the SPSP on utilities and service systems, including wastewater, were evaluated in Section 3.9 and 3.10 of the 2009 SPSP EIR. As described above, the proposed project is within the scope of the analysis of the 2009 SPSP EIR. Significant and potentially significant utilities and service systems impacts identified in the 2009 SPSP EIR that are relevant to the proposed project are presented below with their corresponding levels of significance before and after application of mitigation measures identified in the 2009 SPSP EIR.

2009 SPSP EIR IMPACTS

	Utilities and Service Systems/Water Supply	Level of Significance Prior to Mitigation	Level of Significance After Mitigation
3.10-1	**Increased Demand for Wastewater Conveyance Facilities**. Project implementation would result in increased generation of wastewater.	PS	SU
3.10-2	**Increased Demand for Wastewater Treatment Plant Facilities**. Project implementation would result in increased generation of wastewater, thereby increasing the demand for wastewater treatment facilities to support the proposed project. Wastewater treatment would be provided by the SRWTP.	SU	SU
3.10-3	**Short-Term Generation of Solid Waste during Project Construction.** Construction of the proposed project would generate short-term construction-related debris and waste.	LS	NA
3.10-4	**Increased Generation of Solid Waste during Project Construction**. Project implementation would generate short-term construction-related debris and waste.	LS	NA

2009 SPSP EIR IMPACTS

	Utilities and Service Systems/Water Supply	Level of Significance Prior to Mitigation	Level of Significance After Mitigation
3.10-5	**Increased Demand for Electricity and Infrastructure**. Project implementation would increase the demand for electricity and electrical infrastructure.	LS	NA
3.10-6	**Increased Demand for Natural Gas and Infrastructure**. Project implementation would increase the demand for natural gas and infrastructure and would include the extension of existing natural gas pipelines.	LS	NA
3.10-7	**Increased Demand for Communications Service and Infrastructure**. Implementation of the proposed project would increase the demand for communications service and infrastructure and would include the extension of existing communication lines.	LS	NA
3.10-8	**Increased Demand for Cable Television Service and Infrastructure**	LS	NA
3.10-9	**Increased Energy Demand.** Project implementation would increase energy consumption during construction and operation of the proposed project.	LS	NA
3.9-1	**Increased Demand for Water Supplies.** Project implementation would increase groundwater pumpage in the North American Subbasin and would shift the timing for surface water use as compared to current use, with more water used during winter months and less water used during summer months.	PS	LS
3.9-2	**Need for Off-Site Water Conveyance Facilities.** Project implementation would require construction of offsite water conveyance facilities to implement the surface water element of the project.	PS	LS
3.9-3	**Need for On-Site Water Conveyance and Storage Facilities.** Project implementation would result in increased demand for water supply. On-site water conveyance and storage facilities would be required to deliver water to customers on the project site.	PS	LS

LS=Less than Significant, S=Significant, PS=Potentially Significant, SU=Significant and Unavoidable, NA = Not Applicable

No Mitigation Measures from the 2009 SPSP EIR are relevant to the proposed project for utilities and service systems.

Environmental Checklist and Discussion

Issues (and Supporting Information Sources):	*Potentially Significant Impact*	*Less Than Significant Impact*	*No Impact*	*Impact Adequately Addressed in 2009 SPSP EIR*
17. UTILITIES AND SERVICE SYSTEMS—Would the project:				
a) Conflict with wastewater treatment requirements of the applicable Regional Water Quality Control Board?	☐	☐	☐	☒
b) Require or result in the construction of new water or wastewater treatment facilities or expansion of existing facilities, the construction of which could cause significant environmental effects?	☐	☐	☐	☒

Issues (and Supporting Information Sources):	*Potentially Significant Impact*	*Less Than Significant Impact*	*No Impact*	*Impact Adequately Addressed in 2009 SPSP EIR*
c) Require or result in the construction of new storm water drainage facilities, or expansion of existing facilities, the construction of which could cause significant environmental effects?	☐	☐	☐	☒
d) Require new or expanded water supply resources or entitlements?	☐	☐	☐	☒
e) Result in a determination by the wastewater treatment provider that would serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?	☒	☐	☐	☐
f) Be served by a landfill with sufficient permitted capacity to accommodate the project's solid waste disposal needs?	☐	☐	☐	☒
g) Comply with federal, state, and local statutes and regulations related to solid waste?	☐	☒	☐	☐

Discussion

a-c) **Adequately Addressed in the 2009 SPSP EIR.** The proposed project is the construction and operation of a wastewater conveyance system to support development proposed under the SPSP. Implementation of the proposed project would not result in conflicts with wastewater treatment requirements, or result in construction impacts of new stormwater and water facilities above that already evaluated in the 2009 SPSP EIR. This impact is considered to be adequately addressed in the 2009 SPSP EIR and is less than significant. This issue will not be evaluated in the Focused Tiered EIR.

d) **Adequately Addressed in the 2009 SPSP EIR.** The proposed project is the construction and operation of a wastewater conveyance system to support development proposed under the SPSP. Implementation of the proposed project would not contribute to an increase in water supply demand above that already evaluated in the 2009 SPSP EIR. This impact is considered to be adequately addressed in the 2009 SPSP EIR and is less than significant. This issue will not be evaluated in the Focused Tiered EIR.

e) **Potentially Significant Impact.** The proposed project would result in the construction of a new wastewater conveyance system, the construction of which could result in potentially significant impacts above that already evaluated in the 2009 SPSP EIR. In addition, the proposed project could result in potentially significant impacts related to the conveyance and treatment capacities of Regional San's UNWI and wastewater treatment plant because this issue was not analyzed with current project level details at the time of the 2009 SPSP EIR. Therefore, this issue will be evaluated in the Focused Tiered EIR.

f) **Adequately Addressed in the 2009 SPSP EIR.** The 2009 SPSP EIR found that construction of the SPSP would result in a less-than-significant impact on waste disposal facilities that serve the project area. The same waste management and disposal facilities described in the 2009 SPSP EIR would serve the construction and operation of the proposed project. Regular disposal service for the area would provide ongoing service to waste generated by construction and operation of the proposed project. This impact is considered to be adequately addressed in the 2009 SPSP EIR and is less than significant. This issue will not be evaluated in the Focused Tiered EIR.

g) **Less Than Significant Impact.** The project could require disposal of construction debris, some of which could be contaminated. Debris from construction would be disposed of in a lawful manner consistent with federal, state, and local regulations. Construction debris is composed of a variety

of waste materials, including steel, asphalt, concrete, and piping. This impact is less than significant and will not be evaluated in the Focused Tiered EIR.

Summary

No mitigation measures from the 2009 SPSP EIR are relevant to the proposed project for utilities and service systems and water supply. The proposed project would not exceed the levels of significance relating to utilities and service systems and water supply previously addressed in the 2009 SPSP EIR, nor would it introduce any new significant impacts that were not previously addressed, except for the issue of conveyance and treatment capacity within Regional San's facilities. Therefore, this issue will be evaluated in the Focused Tiered EIR.

References

Sutter County, 2008. Sutter Pointe Specific Plan Project EIR, December 2008.

Mandatory Findings of Significance

The lead agency shall find that a project may have a significant effect on the environment and thereby require an EIR to be prepared for the project where there is substantial evidence, in light of the whole record, that any of the following conditions may occur. Where prior to commencement of the environmental analysis a project proponent agrees to mitigation measures or project modifications that would avoid any significant effect on the environment or would mitigate the significant environmental effect, a lead agency need not prepare an EIR solely because without mitigation the environmental effects would have been significant (per Section 15065 of the State CEQA Guidelines):

Issues (and Supporting Information Sources):	*Potentially Significant Impact*	*Less Than Significant Impact*	*No Impact*	*Impact Adequately Addressed in 2009 SPSP EIR*
a) Does the project have the potential to degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, substantially reduce the number or restrict the range of a rare or endangered plant or animal or eliminate important examples of the major periods of California history or prehistory?	☒	☐	☐	☐
b) Does the project have impacts that are individually limited, but cumulatively considerable? ("Cumulatively considerable" means that the incremental effects of a project are significant when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of past, present and probable future projects)?	☒	☐	☐	☐
c) Does the project have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly?	☒	☐	☐	☐

a) **Potentially Significant Impact.** As discussed in the Environmental Checklist, the proposed project could have potential significant impacts on air quality and greenhouse gas emissions, biological resources, cultural resources, noise, and wastewater conveyance and treatment capacities. These issues will be addressed in the Focused Tiered EIR.

b) **Potentially Significant Impact.** Cumulative projects identified that are ongoing at present or anticipated in the reasonably foreseeable future include construction and operation of other projects in the region that require the conveyance and treatment of wastewater through Regional San facilities. The proposed project could cause long-term impacts on some of the resources in the Environmental Checklist sections. An initial assessment finds that the proposed project could result in potential cumulative impacts on that air quality, biological resources, cultural resources, noise, and wastewater conveyance and treatment capacities. Therefore, these issues will be addressed in the Focused Tiered EIR.

c) **Potentially Significant Impact.** The proposed project's potential effects on air quality, biological resources, cultural resources, noise, and wastewater conveyance and treatment could have potentially significant impacts that could cause substantial adverse effects on human beings. These issues will be addressed in the Focused Tiered EIR. All other impacts to resources identified in the Environmental Checklist are less than significant, have no impact, or were already adequately addressed in the 2009 SPSP EIR and there would be no adverse impacts, direct or indirect, on human beings.

Appendix C
Notice of Preparation and Scoping Comments

ESA

NOTICE OF PREPARATION

ENVIRONMENTAL IMPACT REPORT FOR SUTTER POINTE REGIONAL WASTEWATER CONVEYANCE PROJECT

SUTTER COUNTY

To: Responsible Agencies and Interested Parties

Pursuant to the California Environmental Quality Act (CEQA), Sutter County as the CEQA Lead Agency has prepared this Notice of Preparation (NOP) of an Environmental Impact Report (EIR) for the Sutter Pointe Regional Wastewater Conveyance project (proposed project). The proposed project would extend wastewater service from the Upper Northwest Interceptor (UNWI), operated by the Sacramento Regional County Sanitation District (Regional San), to the Sutter Pointe Specific Plan (SPSP) area. Wastewater service to the SPSP area would be provided by the Regional San and the Sacramento Area Sewer District (SASD) under a Wastewater Service by Contract and Operating Agreement by and between Sutter County, Regional San and SASD (Agreement). The proposed project also includes a Wastewater Conveyance Project (WCP) that proposes on- and off-site facilities needed to convey future wastewater flows from the SPSP Area to the UNWI; including pumping facilities and parallel force mains, for conveyance to the Sacramento Regional Wastewater Treatment Plant (SRWTP) for treatment. The proposed parallel force mains would extend from the SPSP area to a point of connection with the UNWI near the intersection of West 6th Street and Elkhorn Boulevard in Rio Linda, an unincorporated community in Sacramento County. SASD would provide wastewater system operation and maintenance services to Sutter County until such time as the County assumes those duties

Construction of proposed project facilities would be phased. Two initial pumping stations and one of three planned force mains that would connect the SPSP area to the UNWI would be installed and operated first. A regional pump station and the remaining two force mains would be installed and operated at a later date as needed to serve subsequent development of the SPSP area. A more detailed project description is attached to this NOP.

The County has determined that the proposed project may result in potentially significant impacts to the following environmental resources:

- Air quality
- Biological resources
- Cultural resources
- Greenhouse Gas Emissions
- Noise
- Wastewater Infrastructure Treatment and Capacity

Sutter County is soliciting the views of interested persons, organizations, and agencies regarding the scope and content of the environmental information in connection with the proposed project. In addition, each responsible agency shall provide Sutter County with specific detail about the

scope, significant environmental issues, reasonable alternatives, and mitigation measures related to each responsible agency's area of statutory responsibility as it relates to the scope of the EIR. In accordance with CEQA Guidelines Section 15082(b)(1)(B), responsible and trustee agencies should indicate their respective level of responsibility for the project in their response.

The following is a list of responsible and trustee agencies identified for this project: The U.S. Army Corps of Engineers; U.S. Fish and Wildlife Service; California Department of Fish and Wildlife; and the Central Valley Regional Water Quality Control Board. In addition, Sutter County Local Agency Formation Commission (LAFCO), Regional San, and SASD will use the information in the EIR for the assessment of requested entitlements.

All comments received will be made available for public review in their entirety, including the names and addresses of the respondents. Individual respondents may request that their name and/or address be withheld from public disclosure. Sutter County will honor such requests to the extent allowable by law. If you wish us to withhold your name and/or address, you must state this prominently at the beginning of your comment.

This NOP will be circulated for a public response period beginning January 22, 2016 and ending February 22, 2016. At the end of the public response period, Sutter County will consider all comments received from interested persons, organizations, and agencies in preparing the environmental analysis to be included in the EIR.

Please submit your written comments on the scope of the EIR at the earliest possible date, but no later than 5 p.m. on February 22, 2016:

Sutter County Development Services Department
Attention: Danelle Stylos, Director
1130 Civic Center Boulevard, Suite A
Yuba City, CA 95993
dstylos@co.sutter.ca.us

SUTTER POINTE REGIONAL WASTEWATER CONVEYANCE

Project Description

Introduction

Sutter County (the County), proposes to implement the Sutter Pointe Regional Wastewater Conveyance project (proposed project) to extend wastewater service from the Upper Northwest Interceptor (UNWI), operated by the Sacramento Regional County Sanitation District (Regional San), to the Sutter Pointe Specific Plan (SPSP) area. Wastewater service to the SPSP area would be provided by the Regional San and the Sacramento Area Sewer District (SASD) under a Wastewater Service by Contract and Operating Agreement by and between Sutter County, Regional San and SASD (Agreement). The proposed project also includes a Wastewater Conveyance Project (WCP) that proposes on- and off-site facilities needed to convey future wastewater flows from the SPSP Area to the UNWI; including pumping facilities and parallel force mains, for conveyance to the Sacramento Regional Wastewater Treatment Plant (SRWTP) for treatment. SASD would provide wastewater system operation and maintenance services to Sutter County until such time as the County assumes those duties.

Construction of proposed project facilities would be phased. Two initial pumping stations and one of three planned force mains that would connect the SPSP area to the UNWI would be installed and operated first. A regional pump station and the remaining two force mains would be installed and operated at a later date as needed to serve subsequent development of the SPSP area.

Project Background

The SPSP area is not currently served by any municipal wastewater collection and treatment system. Existing residential, industrial and commercial uses within the area are served by individual on-site septic tank systems. In 2009 the County approved the SPSP and certified the Environmental Impact Report (EIR) (SCH#2007032157). In addition, a Sewer Master Plan was developed (2008 Sewer Master Plan) that estimated wastewater demand from development of the SPSP and presented various options for providing wastewater service to the SPSP area. It also identified on- and off-site infrastructure needs for the options. The 2008 Sewer Master Plan:(1) concluded that the preferred options would be to extend service from the Regional San system; (2) confirmed the ability of the County to connect the Regional San system; and (3) confirmed the ability of Regional San to accept wastewater flows from the SPSP area. Over time, as the SPSP is built out, the 2008 Master Plan will need to be updated and future master plans will need to include additional detail on both on- and off-site infrastructure including: (1) on-site pump

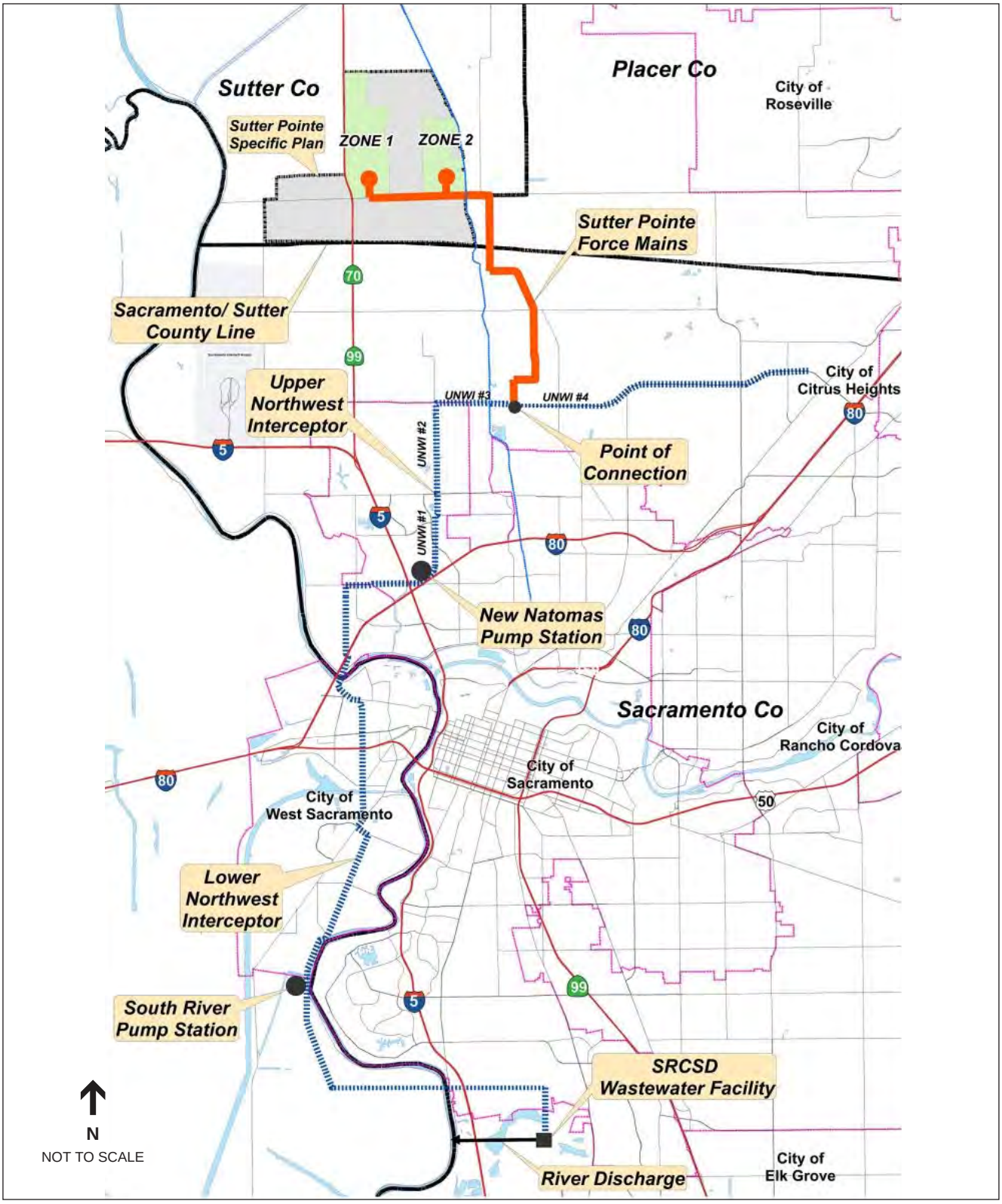
stations, force mains, trunk lines and major collectors; (2) facility phasing; and (3) collector and lateral systems to serve individual lots. The 2009 SPSP EIR evaluated the impacts on the environment from construction of on- and off-site wastewater conveyance infrastructure options presented in the 2008 SEWER Master Plan.

In 2015, the WCP was developed to provide more detailed information about the on- and off-site infrastructure needed to serve Phase I of the SPSP and additional information on future off-site facilities that would be needed to convey future flows from the SPSP area to the UNWI. The WCP and identified wastewater conveyance facilities are described in more detail below under the Project Description.

Mitigation measures adopted by the County for the SPSP included developing and executing an agreement-in-principal, a wastewater services agreement, an operations agreement, and paying connection and capacity fees to the Regional San through these agreements. In 2009, the County and Regional San entered into an agreement-in-principal (Principles of Agreement) to convey wastewater flows generated within the SPSP area to the UNWI for treatment at the SRWTP and discharge to the Sacramento River. The Principles of Agreement set forth the basic terms and conditions under which Regional San would extend service to the SPSP area. It also established the framework for a future service agreement which is the Wastewater Service by Contract and Operating Agreement. The Agreement is described in more detail below under the Project Description.

Project Location

The proposed project would initiate within the SPSP area. The SPSP area encompasses approximately 7,528 acres in south Sutter County, immediately north of the Sutter/Sacramento County line. It is located approximately 12 miles north of downtown Sacramento and 2 miles northeast of Sacramento International Airport. The Sacramento River is situated about 1 mile west of the project site (Figure 1). The SPSP area is generally bounded by Natomas Road on the east and Powerline Road on the west. The northern boundary is approximately four miles north of the Sutter County line. State Route (SR) 99/70 divides the southern portion of the SPSP and serves as the western boundary of the northern portion of the SPSP. The proposed project would include the construction of pumping facilities and parallel force mains from SPSP to a point of connection with the UNWI near the intersection of West 6th Street and Elkhorn Boulevard in Rio Linda, an unincorporated community in Sacramento County. The proposed force main route from the SPSP area would be approximately seven miles in length. The force main route would begin at the connection with the UNWI at W. Elkhorn Boulevard to W. 6th Street, then along W. M Street, W. 2nd Street, Elwyn Avenue, Rio Linda Boulevard, Pleasant Grove Road, and W. Riego Road, where it would enter the SPSP area connecting with the proposed pump stations located in Zone 1 and Zone 2 (described below) as shown in Figure 2.

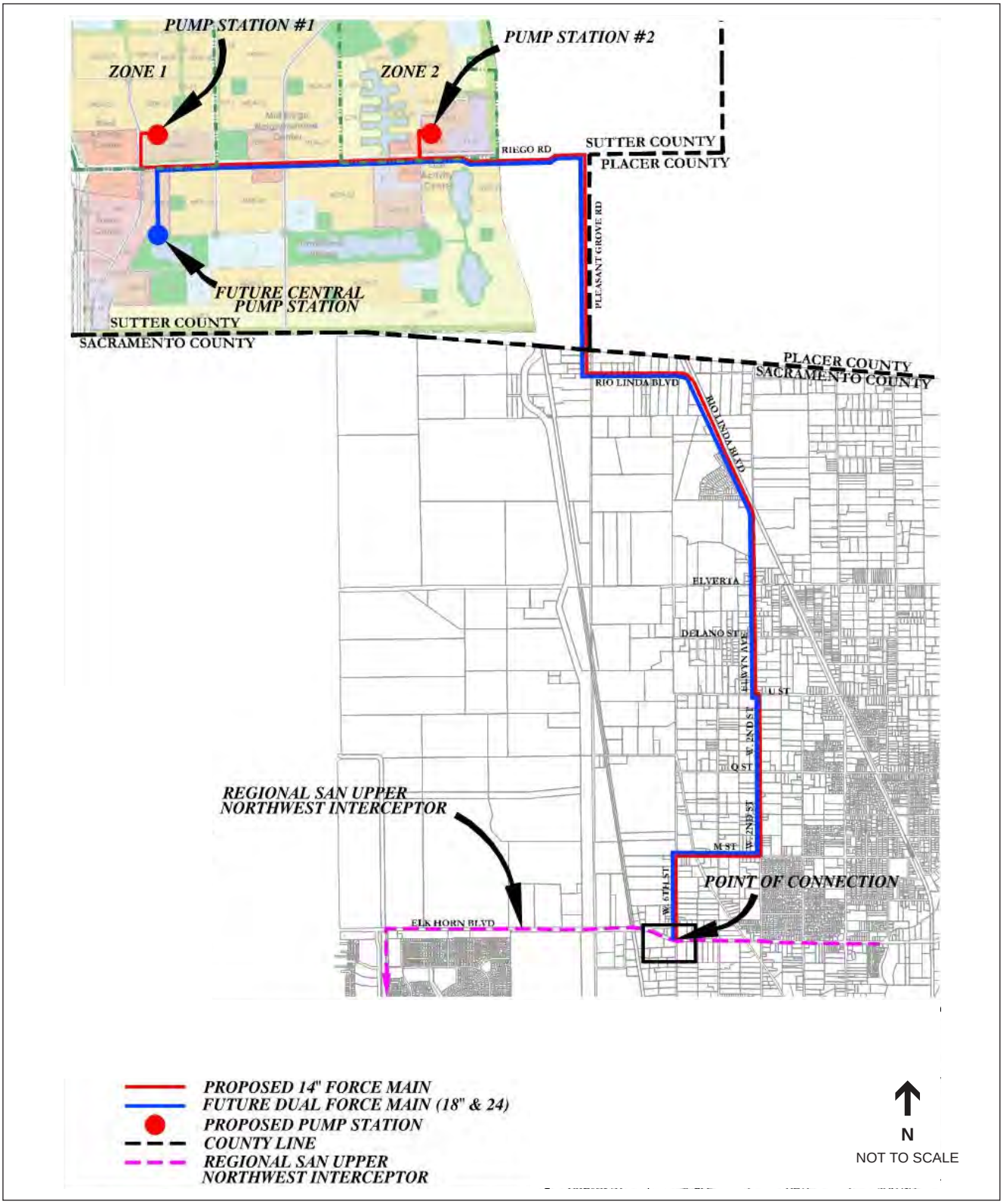


SOURCE: MacKay & Somps 2015

Sutter Pointe Regional Wastewater Conveyance Project . 130145

Figure 1

Project Regional Location



SOURCE: MacKay & Somps 2015

Sutter Pointe Regional Wastewater Conveyance Project . 130145

Figure 2
Project Site

Project Objectives

The objectives of the proposed project are to:

- provide adequate wastewater conveyance, treatment and discharge to support buildout of the SPSP Area in compliance with the SPSP and Sewer Master Plan;
- not adversely affect the conveyance or treatment capacity of existing facilities; and,
- comply with the Natomas Basin Habitat Conservation Plan, Sacramento Area Flood Control Agency flood control plans, and other regional resource conservation and land use plans.

Project Description

The specific components of the proposed project include the Agreement, WCP, and details on the pumping facilities and parallel force mains connecting the SPSP area to the UNWI. Each of these components is described in more detail below.

Wastewater Service by Contract and Operating Agreement

The Agreement is a three-party contract between Regional San, SASD, and the County to extend wastewater services to the SPSP area. The Agreement describes the terms and conditions under which these three agencies would divide the responsibilities, duties and obligations to provide wastewater service to the SPSP. Specifically, the Agreement addresses the legal, operational and administrative details of providing wastewater service to the SPSP area. No physical facilities are proposed as part of the Agreement; physical facilities are identified as part of the WCP, as described below. Under the terms of the Agreement, the County, through a yet to be formed independent special district, would be responsible to collect wastewater flows generated from development in the SPSP area. The wastewater flows would be conveyed to the UNWI operated by Regional San. Regional San would then convey the SPSP flows, along with the flows from its Contributing Members and Contracting Agencies[1], to the SRWTP for treatment. After treatment, SPSP flows are discharged into the Sacramento River just downstream of the Freeport Bridge.

Under the terms of the Agreement, the respective responsibilities of the three agencies would be as follows:

- The County would be responsible for the design, construction, financing and ownership of all wastewater facilities within the SPSP area (including the off-site force mains);
- SASD would be responsible for operation and maintenance of proposed facilities using their existing operational resources and management expertise; and
- Regional San would accept the wastewater flows generated by development in the SPSP area at the proposed point of connection and would treat the flows at the SRWTP prior to

[1] Regional San provides service to the cities of Sacramento, West Sacramento, Citrus Heights, Elk Grove, Folsom, and Rancho Cordova; unincorporated Sacramento County; and the communities of Courtland and Walnut Grove. Contributing agencies include SASD and the cities of Folsom, Sacramento and West Sacramento.

discharge into the Sacramento River under and consistent with the terms and conditions of its National Pollutant Discharge Elimination System (NPDES) Waste Discharge Permit.

In addition to the typical terms of these types of agreements, the Agreement specifically identifies the respective duties and responsibilities of the parties in the following areas:

- *SPSP Sewer Facilities* – A description of contemplated sewer facilities; the timing, design and construction of the sewer facilities; the cost and financing of the sewer facilities; easements and rights-of-way of the sewer facilities; facility modifications (if required); and details to the future transfer of ownership of the sewer facilities.
- *Operation & Maintenance* – A description of the operation and maintenance of the sewer facilities; rights of access to the sewer facilities; odor and corrosion control; data acquisition and sharing; and non-permitted discharges and notifications.
- *Sewer System Overflow (SSO) Coordination* – Incident ownership; SSO responsibility; and SSO Reporting.
- *Planning Coordination* – Capacity planning; capacity demands and limitations; and planning updates.
- *Financial Considerations* – Accounting and billing; rates and fees; industrial pre-treatment; audits; repairs and replacements; wastewater source control programs, and other costs.
- *Emergency Mutual Aid* – Mutual aid coordination; and resource utilization.
- *Adherence to Regulations* – Applicable laws and regulations; coordination on regional sewer ordinance issues; and wastewater discharge pretreatment program.

The Agreement contemplates that the County would be responsible to pay all applicable rates of SASD and all applicable rates and fees of Regional San for each of the County's users that contribute flow to SPSP system and discharges into the Regional San system. Additionally, the County would have the responsibility to comply with the requirements of Proposition 218 as it relates to those users who use the SPSP sewer system. The Agreement also requires the parties to track their various costs and revenues over time and each agency would be appropriately reimbursed by the others at specified intervals.

Wastewater Conveyance Project

The SPSP area will be developed in phases over time. The initial phase (Phase 1) includes the development of approximately 2,100 acres (Zone 1 and Zone 2 on Figure 2) and 12,600 equivalent single family dwellings (ESDs) of wastewater demand (calculated at an average density of 6 ESDs/acre). The WCP addresses the facilities necessary to convey flows from a portion of Phase 1 (Initial Development Area) equal to approximately 550 acres and 3,300 ESDs (2.51 million gallons per day (mgd) Peak Wet Weather Flow [PWWF]). The land uses for the Initial Development Area include: low, medium and high-density residential, schools, parks and open space, detention basins, commercial and employment uses. The sequence of development within the Phase 1 area would occur in phases and/or sub-phases, which could change and/or move forward out of sequence, subject to County approval, providing that improvements necessary to serve the Initial Development Area are sufficient to provide reliable wastewater conveyance service.

Initial Development Area Facilities

Proposed Initial Development Area facilities include two medium capacity, on-site wastewater pump stations and one of three proposed force mains connecting the pump stations with the UNWI. Pump stations would be installed below ground in a concrete vaults with control and electrical equipment located above ground in a fenced and secured area above the pump station (approximately 120 feet by 120 feet, or approximately14,400 square feet each). The pump stations would be covered and the fenced and secure area would be paved with asphaltic concrete, including the access driveways.

One pump station (1.53 mgd PWWF) would be located within Zone 1 and one pump station (2.51 mgd PWWF) would be located within Zone 2 (see Figure 2). Two miles of 12-inch diameter force main would connect the Zone 1 and Zone 2 pump stations and a seven mile long 14-inch diameter force main would connect the Zone 2 pump station to the point of connection with the UNWI near the intersection of Elkhorn Boulevard and West 6th Street in Sacramento County (a total of nine miles of pipe). Zone 1 and Zone 2 could be developed independently or concurrently. In the case that either zone moves forward independently, the pump stations and force main would be phased accordingly. The alignment of the force main once it leaves the SPSP is as follows:

1. East on Riego Road to Pleasant Grove Road for totaling approximately 1.2± miles. Within this length of force main the alignment would transition from the north to the south outside the roadway westerly of the Natomas East Main Drainage Canal;
2. South on Pleasant Grove Road for approximately 1.3 miles;
3. East on Rio Linda Blvd and following it southerly for a total distance of approximately 2.5± miles to U street;
4. East on U Street for 150± feet to West 2nd Street;
5. South on West 2nd Street for approximately 1.0± mile to M Street;
6. West on M Street for approximately 0.5± miles to West 6th Street; and
7. South on West 6th Street for 0.5± miles where the force main would connect to the Regional San UNWI at the intersection of Elkhorn Boulevard.

Operation and Maintenance

In accordance with the Agreement, SASD would provide operation and maintenance (O&M) services for the SPSP wastewater collection and conveyance system. SASD would perform routine preventative maintenance on the system (including pump stations, main lines). For the Pump Stations, maintenance activities would occur annually, quarterly, and monthly, as needed to address any mechanical, electrical, and instrumentation issues. For the force mains, maintenance would occur based on a predictive and preventive maintenance programs. Cleaning intervals would occur every two years after the first 10 years of use.

Future Facilities

As the SPSP area develops over time, additional wastewater pumping and conveyance facilities would be required. These improvements would be phased in over time as demands increase. When built out, the SPSP area would contain a number of lift stations strategically located throughout the development that would lift wastewater flows into downstream trunk sewer lines.

These trunk sewer lines would convey the sewer flows to a Central Pumping Station (23.1 MGD PWWF). The Central Pumping Station is planned to be located at the western end of the Great Park as the park is shown on the approved SPSP land use plan. The Central Pumping Station would then pump these flows into the proposed 14-inch diameter force main and two future parallel force mains that would convey the flow to the UNWI. These two future force mains (18 inch and a 24-inch diameter) would be phased into service at different times. The route of these future force mains are planned to follow the same general alignment as the proposed project force.

Construction Considerations

Pump Station

Each pump station would require a deep, open pit excavation approximately 30 feet in depth. A pump station will be constructed in the excavation and then the excavation will be backfilled. Following installation of the pump station structure, pumping equipment (pumps, motors, valves and piping) and motor control system improvements would be installed. Electrical power and telecommunications facilities for telemetry control of the operation of the pump station would also be installed and an all-weather access road would be constructed. Once the installation is complete disturbed areas would be restored to pre-construction conditions. The pumps station sites would be paved and fencing and landscaping would be installed.

Force Main

Most of the proposed force main would be installed within existing roadway rights-of-way (ROW). A portion of the proposed alignment would occur outside of the existing roadway within future Roads 1 and 2 within the SPSP area, along the southerly side of the future bridges across the Natomas East Main Drainage Channel (NMDEC) and the existing railroad tracks. Small portions of the alignment along the route of the force main fall outside of the existing roadways and/or require access to private property. In these cases, the project proponent would obtain the necessary ROW and permanent and/or temporary construction easements from the affected property owners to permit construction of the force main.

The proposed force main would be constructed using a combination of open trench and bore and jack construction methods. Open trenching would be used except where the force main is proposed to be installed under existing surface features such as the Natomas Basin Levee, the NMDEC and the railroad tracks. There are several locations where the force main would cross local drainage features (culverts). Where the alignment would cross a culvert, the culvert would

be cut through or removed, and then replaced after construction of the force maim. Where the force main would cross an existing bridge structure, it would be attached to the outside of the bridge.

Open trench construction methods would consist of the excavation of a shallow trench, typically 3-1/2 feet wide by 6 feet deep. Trench walls would be shored up when more than six feet in depth. The floor of the trench would be prepared with imported pipe bedding material (typically imported sand), and then the force main pipe would be installed and covered with initial backfill material (typically imported sand). After compaction of the bedding and initial backfill material, the trench would be backfilled with native materials to pavement subgrade level. The top surface of the trench and all disturbed pavement areas would be repaved with temporary paving until the trench settlement period has elapsed. Then permanent asphalt concrete over aggregate base in like kind and depth to the existing pavement would be installed. In unpaved areas, the surface of the trench and all disturbed areas would be restored to existing conditions and revegetated with native plant materials.

In areas where a bore and jack construction methods would be used, a bore pit would be excavated at each end of the bore location (typically 15 feet wide by 30 feet long by 6 feet deep). A boring machine would be positioned in one of the pits and a casing pipe would be "bored and jacked" under the surface obstruction. Then the force main would be slipped into the casing pipe and the area between the force main pipe and the carrier pipe would be backfilled with air blown sand. The boring would then be closed up and the bore pits backfilled.

Approximately 1,000 linear feet of force main would be installed per day. Due to the linear nature of the force main, and the narrow width of the existing roads within which the majority of the force main is proposed to be installed, the work area for the construction of the force main would be limited. Accordingly, it is anticipated that the road closures would be necessary to accommodate installation of the force main. Roadways would be open to two lanes of traffic during non-working (night-time) hours with trench plates covering all open trenches within roadways during off construction hours.

Construction Staging

Construction staging and laydown areas (staging areas) would be strategically located throughout the project area. Due the size of the project area (approximately 9 miles in length), several on-site and off-site staging areas would be required. All staging areas would be constructed and maintained in accordance with the requirements of the California Construction General Permit (Order No. 2009-0009-DWQ, National Pollutant Discharge Elimination System (NPDES) General Permit No. CAS000002) and the Best Management Practices standards of the California Stormwater Quality Association (BMP Standards). Staging areas would include gravel access driveways to minimize the tracking of dirt onto public roads, spill containment facilities, and concrete washout areas. Whenever practical, construction materials, supplies, and equipment would be stored inside a staging area. Upon completion of construction activities leftover construction materials would be removed and the areas would be regraded and restored to existing conditions and revegetated with native plant materials.

One on-site staging area would be located near each of the two proposed pump stations. These staging areas would accommodate and support the construction activities of the pump stations (including storage of pump station materials and equipment) and the force main (including storage of force main piping materials and supplies). The on-site staging areas would each cover an area of approximately two acres and they would be surrounded by a temporary 6-foot high chain link fence with ingress and egress driveways and gates.

It is anticipated that several off-site staging areas would be located along the route of the proposed force main. Each staging area would be approximately one acre in size and would accommodate and support the construction activities of the proposed force main, including storage of trench spoil materials, equipment storage, force main piping materials and other supplies.

Other Construction Considerations

Due to the high groundwater elevations within the

SPSP area and the northern portion of the force main route, it is anticipated that dewatering would be necessary using either a well point system or an in-trench sump pump. Water from the dewatering activities would be pumped into trailer mounted settling tanks, then discharged to the local agricultural drainage system. The County would require the filing of a Notice of Intent (NOI) for coverage and comply with the requirements contained in National Pollutant Discharge Elimination Permit System (NPDES) No. CAG995001 Waste Discharge Requirements General Order for Dewatering and Other Low Threat Discharges to Surface Waters prior to discharging water to the local agricultural drainage system.

Project Schedule

Installation of the pump stations and force mains would be anticipated to begin in spring 2017 and would be completed by late fall 2017, with a duration of approximately 6 for construction of the force mains, and up to 8 months for construction of the pump stations. Construction work times would occur Monday through Saturday from 7 a.m. to 7 p.m.

Workforce and Equipment

Pump Station

The construction of the pump stations would occur over the entire 8-month construction period, more or less. It is anticipated that the construction of each pump station would require a construction crew consisting of an average of six construction workers over the duration of the construction period. Table 1 presents the construction equipment would likely be required at various times during the construction of each pump station. The estimated number of construction vehicles and equipment, and their estimated average use during the construction of each pump station is shown.

TABLE 1
PUMP STATION CONSTRUCTION EQUIPMENT

Type of Equipment	Number of Equipment	Average Use (per day/duration)
Pickups	4	4 hours/6-8 months
Small Backhoe	1	4 hours/6-8 months
Large Excavator Backhoe	1	8 hours/2 weeks
Dump Truck	2	8 hours/2 months
Flat Bed Truck	1	4 hours/6-8 months
Vibratory Compactor	1	8 hours/1 month
Ready-mix Concrete Trucks	2	8 hours/1 month
Asphalt Paver	1	8 hours/1 week
Asphalt Roller	1	8 hours/1 week
Small Bulldozer	1	4 hours/6-8 months
Small Crane or Large Boom Truck	1	8 hours/6-8 months
15 KW Portable Generator	1	8 hours/6-8 months
Dewatering Pump System	1	24 hours/2 months

Force Main

The construction of the force main would occur over an approximately 6 month period and would require a construction crew consisting of an average of 20 construction workers over the duration of the construction period. Table 2 presents the construction equipment would likely be required at various times during the installation of the force main. The estimated number of construction vehicles and equipment, and their estimated average use during the installation of the force main is shown.

TABLE 2
FORCE MAIN CONSTRUCTION EQUIPMENT

Type of Equipment	Number of Equipment	Average Use (per day/duration)
Pickups	8	4 hours/3-4 months
Small Backhoe	4	8 hours/3-4 months
Large Excavator Backhoe	2	8 hours/3-4 months
Dump Truck	4	8 hours/3-4 months
Flat Bed Truck	2	8 hours/3-4 months
Vibratory Compactor	2	8 hours/1 month
Bore and Jack Machine	1	8 hours/2 weeks
Asphalt Paver	1	8 hours/2 weeks
Asphalt Roller	1	8 hours/2 weeks
Small Loader	4	8 hours/3-4 months
Small Boom Truck	2	8 hours/3-4 months
5 KW Portable Generator	1	4 hours/3-4 months
Ready-mix Concrete Trucks	1	4 hours/3-4 months
Dewatering Pump System	1	24/2 months

SMUD™

February 16, 2016

Danelle Stylos
Sutter County
113 Civic Center Blvd, Suite A
Yuba City, CA 95993

Subject: Notice of Preparation (NOP), Sutter Pointe Regional Wastewater Conveyance Project

Dear Ms. Stylos,

The Sacramento Municipal Utility District (SMUD) appreciates the opportunity to provide comments on the NOP, Sutter Pointe Regional Wastewater Conveyance Project. SMUD is the primary energy provider for Sacramento County and the proposed project area. SMUD's vision is to empower our customers with solutions and options that increase energy efficiency, protect the environment, reduce global warming, and lower the cost to serve our region. As a Responsible Agency, SMUD aims to ensure that the proposed project limits the potential for significant environmental effects on SMUD facilities, employees, and customers.

It is our desire that the NOP, Sutter Pointe Regional Wastewater Conveyance Project will acknowledge any project impacts related to the following:

1. SMUD has two sets of three phase 230kV overhead transmission lines located in the proposed project areas. Please see the approximate locations of these transmission lines and structures shown in the area outlined in red on Image 1.

2. Under no circumstance shall any grading or construction activities be permitted within SMUD's transmission line easements without the conveyance of rights from SMUD's real estate department. Should applicant be found performing unapproved improvements, the applicant will be responsible for returning the property to its original condition at their expense.

3. Project owner or contractor shall comply with the clearance requirements between the proposed improvements and SMUD overhead transmission lines per the latest revision of California Public Utilities Commission, General Order No. 95. Project owner or contractor shall abide the clearance requirements from all CAL-OSHA Title 8 approach distance as stated in Subchapter 5, Group 2, Article 37, during project construction.

Image 1

4. All boom-operated construction equipment within SMUD's easement corridor shall be equipped with a mechanical lock-out device to prevent the boom from extending above the Cal-OSHA required clearance distance to SMUD's energized high voltage lines and fiber optic communication lines.

5. Project Owner or contractor is responsible for assessing any impacts (including but not limited to induced voltage and current effects) to its facilities as a result of constructing and operating their facilities within close proximity to SMUD's high voltage transmission lines.

6. Project Owner or contractor is responsible for ensuring that any subcontractor performing work in the subject right of way is aware and abides by these conditions.

7. There shall be no storage of fuel or combustibles and no fueling of vehicles within the SMUD easement.

8. There shall be no long term staging or storage of construction materials within the SMUD easement, such materials shall be removed from the easement at the completion of the project.

9. Add the following note to drawings:

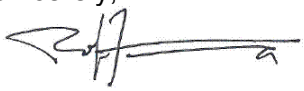
WARNING – SMUD 230KV OVERHEAD LINES ARE LIVE – Electrocution Potential. Contractor shall take all appropriate safety measures when working near or under lines, including placement of OSHA-required warning signage. On-site SMUD inspection

required when working within 25 feet of SMUD facilities. Contractor shall contact SMUD's Ricky Plaza at (916) 732-5905 or (916) 799-5733 to schedule inspection. 72-hour advance notice is required. Contractor shall protect SMUD facilities during construction and notify SMUD immediately if facilities are damaged. Any damage to existing facilities shall be repaired at the contractor's expense.

For additional information please visit our website and review our Guide for Transmission Encroachment
https://www.smud.org/assets/documents/pdf/Guide-for-Transimssion-Encroachment.pdf

SMUD would like to be involved with discussing the above areas of interest as well as discussing any other potential issues. Please convey to project owner that detailed engineering drawings for any improvements that are proposed within the SMUD transmission line easement be provided to SMUD engineering. We aim to be partners in the efficient and sustainable delivery of the proposed project. Please ensure that the information included in this response is conveyed to the project planners and the appropriate project proponents. Environmental leadership is a core value of SMUD and we look forward to collaborating with you on this project. Again, we appreciate the opportunity to provide input on this MND. If you have any questions regarding this letter, please contact Emily Bacchini, SMUD Environmental Specialist at (916) 732-6334.

Sincerely,



Rob Ferrera
Environmental Specialist
Environmental Management
Workforce and Enterprise Services
Sacramento Municipal Utility District

Cc: Emily Bacchini
Rob Ferrera
Jose Bodipo-Memba
Pat Durham
Joseph Schofield
Wenjie Chen

STATE OF CALIFORNIA – CALIFORNIA NATURAL RESOURCES AGENCY EDMUND G. BROWN JR., GOVERNOR

CENTRAL VALLEY FLOOD PROTECTION BOARD
3310 El Camino Ave., Rm. 151
SACRAMENTO, CA 95821
(916) 574-0609 FAX: (916) 574-0682

February 8, 2016

Ms. Danelle Stylos
Sutter County
113 Civic Center Boulevard, Suite A
Yuba City, CA 95993

Subject: CEQA Comments: Sutter Pointe Regional Wastewater Conveyance Project Notice of Preparation, SCH No.: 2016012048

Location: Sutter County

Dear Ms. Stylos:

Central Valley Flood Protection Board (Board) staff has reviewed the subject document and provides the following comments:

The proposed project is within the Sacramento River which is a regulated stream under Board jurisdiction, and may require a Board permit prior to construction.

The Board's jurisdiction covers the entire Central Valley including all tributaries and distributaries of the Sacramento and San Joaquin Rivers, and the Tulare and Buena Vista basins south of the San Joaquin River.

Under authorities granted by California Water Code and Public Resources Code statutes, the Board enforces its Title 23, California Code of Regulations (Title 23) for the construction, maintenance, and protection of adopted plans of flood control, including the federal-State facilities of the State Plan of Flood Control, regulated streams, and designated floodways.

Pursuant to Title 23, Section 6 a Board permit is required prior to working within the Board's jurisdiction for the placement, construction, reconstruction, removal, or abandonment of any landscaping, culvert, bridge, conduit, fence, projection, fill, embankment, building, structure, obstruction, encroachment, excavation, the planting, or removal of vegetation, and any repair or maintenance that involves cutting into the levee.

Permits may also be required to bring existing works that predate permitting into compliance with Title 23, or where it is necessary to establish the conditions normally imposed by permitting. The circumstances include those where responsibility for the works has not been clearly established or ownership and use have been revised.

Other federal (including U.S. Army Corps of Engineers Section 10 and 404 regulatory permits), State and local agency permits may be required and are the applicant's responsibility to obtain.

Board permit applications and Title 23 regulations are available on our website at http://www.cvfpb.ca.gov/. Maps of the Board's jurisdiction are also available from the California Department of Water Resources website at http://gis.bam.water.ca.gov/bam/.

Should you have any questions, feel free to contact Mr. James Herota of my staff by phone at (916) 574-0651, or via email at james.herota@water.ca.gov .

Sincerely,

Eric Butler, Chief
Projects and Environmental Branch

cc: Governor's Office of Planning and Research
State Clearinghouse
1400 Tenth Street, Room 121
Sacramento, California 95814

California Water Boards

Edmund G. Brown Jr.
Governor

Matthew Rodriquez
Secretary for
Environmental Protection

Central Valley Regional Water Quality Control Board

16 February 2016

Danelle Stylos
Sutter County
113 Civic Center Boulevard, Suite A
Yuba City, CA 95993

CERTIFIED MAIL
91 7199 9991 7035 8422 5554

COMMENTS TO REQUEST FOR REVIEW FOR THE NOTICE OF PREPARATION FOR THE DRAFT ENVIRONMENTAL IMPACT REPORT, SUTTER POINTE REGIONAL WASTEWATER CONVEYANCE PROJECT, SCH# 2016012048, SUTTER COUNTY

Pursuant to the State Clearinghouse's 22 January 2016 request, the Central Valley Regional Water Quality Control Board (Central Valley Water Board) has reviewed the *Request for Review for the Notice of Preparation for the Draft Environment Impact Report* for the Sutter Pointe Regional Wastewater Conveyance Project, located in Sutter County.

Our agency is delegated with the responsibility of protecting the quality of surface and groundwaters of the state; therefore our comments will address concerns surrounding those issues.

I. Regulatory Setting

Basin Plan

The Central Valley Water Board is required to formulate and adopt Basin Plans for all areas within the Central Valley region under Section 13240 of the Porter-Cologne Water Quality Control Act. Each Basin Plan must contain water quality objectives to ensure the reasonable protection of beneficial uses, as well as a program of implementation for achieving water quality objectives with the Basin Plans. Federal regulations require each state to adopt water quality standards to protect the public health or welfare, enhance the quality of water and serve the purposes of the Clean Water Act. In California, the beneficial uses, water quality objectives, and the Antidegradation Policy are the State's water quality standards. Water quality standards are also contained in the National Toxics Rule, 40 CFR Section 131.36, and the California Toxics Rule, 40 CFR Section 131.38.

The Basin Plan is subject to modification as necessary, considering applicable laws, policies, technologies, water quality conditions and priorities. The original Basin Plans were adopted in 1975, and have been updated and revised periodically as required, using Basin Plan amendments. Once the Central Valley Water Board has adopted a Basin Plan amendment in noticed public hearings, it must be approved by the State Water Resources Control Board (State Water Board), Office of Administrative Law (OAL) and in some cases,

the United States Environmental Protection Agency (USEPA). Basin Plan amendments only become effective after they have been approved by the OAL and in some cases, the USEPA. Every three (3) years, a review of the Basin Plan is completed that assesses the appropriateness of existing standards and evaluates and prioritizes Basin Planning issues.

For more information on the *Water Quality Control Plan for the Sacramento and San Joaquin River Basins*, please visit our website:
http://www.waterboards.ca.gov/centralvalley/water_issues/basin_plans/.

Antidegradation Considerations

All wastewater discharges must comply with the Antidegradation Policy (State Water Board Resolution 68-16) and the Antidegradation Implementation Policy contained in the Basin Plan. The Antidegradation Policy is available on page IV-15.01 at:
http://www.waterboards.ca.gov/centralvalleywater_issues/basin_plans/sacsjr.pdf

In part it states:

> *Any discharge of waste to high quality waters must apply best practicable treatment or control not only to prevent a condition of pollution or nuisance from occurring, but also to maintain the highest water quality possible consistent with the maximum benefit to the people of the State.*
>
> *This information must be presented as an analysis of the impacts and potential impacts of the discharge on water quality, as measured by background concentrations and applicable water quality objectives.*

The antidegradation analysis is a mandatory element in the National Pollutant Discharge Elimination System and land discharge Waste Discharge Requirements (WDRs) permitting processes. The environmental review document should evaluate potential impacts to both surface and groundwater quality.

II. Permitting Requirements

Construction Storm Water General Permit

Dischargers whose project disturb one or more acres of soil or where projects disturb less than one acre but are part of a larger common plan of development that in total disturbs one or more acres, are required to obtain coverage under the General Permit for Storm Water Discharges Associated with Construction Activities (Construction General Permit), Construction General Permit Order No. 2009-009-DWQ. Construction activity subject to this permit includes clearing, grading, grubbing, disturbances to the ground, such as stockpiling, or excavation, but does not include regular maintenance activities performed to restore the original line, grade, or capacity of the facility. The Construction General Permit requires the development and implementation of a Storm Water Pollution Prevention Plan

(SWPPP).

For more information on the Construction General Permit, visit the State Water Resources Control Board website at:
http://www.waterboards.ca.gov/water_issues/programs/stormwater/constpermits.shtml.

Phase I and II Municipal Separate Storm Sewer System (MS4) Permits[1]
The Phase I and II MS4 permits require the Permittees reduce pollutants and runoff flows from new development and redevelopment using Best Management Practices (BMPs) to the maximum extent practicable (MEP). MS4 Permittees have their own development standards, also known as Low Impact Development (LID)/post-construction standards that include a hydromodification component. The MS4 permits also require specific design concepts for LID/post-construction BMPs in the early stages of a project during the entitlement and CEQA process and the development plan review process.

For more information on which Phase I MS4 Permit this project applies to, visit the Central Valley Water Board website at:
http://www.waterboards.ca.gov/centralvalley/water_issues/storm_water/municipal_permits/.

For more information on the Phase II MS4 permit and who it applies to, visit the State Water Resources Control Board at:
http://www.waterboards.ca.gov/water_issues/programs/stormwater/phase_ii_municipal.shtml

Industrial Storm Water General Permit
Storm water discharges associated with industrial sites must comply with the regulations contained in the Industrial Storm Water General Permit Order No. 2014-0057-DWQ.

For more information on the Industrial Storm Water General Permit, visit the Central Valley Water Board website at:
http://www.waterboards.ca.gov/centralvalley/water_issues/storm_water/industrial_general_permits/index.shtml.

Clean Water Act Section 404 Permit
If the project will involve the discharge of dredged or fill material in navigable waters or wetlands, a permit pursuant to Section 404 of the Clean Water Act may be needed from the United States Army Corps of Engineers (USACOE). If a Section 404 permit is required by the USACOE, the Central Valley Water Board will review the permit application to ensure that discharge will not violate water quality standards. If the project requires surface water

[1] Municipal Permits = The Phase I Municipal Separate Storm Water System (MS4) Permit covers medium sized Municipalities (serving between 100,000 and 250,000 people) and large sized municipalities (serving over 250,000 people). The Phase II MS4 provides coverage for small municipalities, including non-traditional Small MS4s, which include military bases, public campuses, prisons and hospitals.

drainage realignment, the applicant is advised to contact the Department of Fish and Game for information on Streambed Alteration Permit requirements.

If you have any questions regarding the Clean Water Act Section 404 permits, please contact the Regulatory Division of the Sacramento District of USACOE at (916) 557-5250.

Clean Water Act Section 401 Permit – Water Quality Certification

If an USACOE permit (e.g., Non-Reporting Nationwide Permit, Nationwide Permit, Letter of Permission, Individual Permit, Regional General Permit, Programmatic General Permit), or any other federal permit (e.g., Section 10 of the Rivers and Harbors Act or Section 9 from the United States Coast Guard), is required for this project due to the disturbance of waters of the United States (such as streams and wetlands), then a Water Quality Certification must be obtained from the Central Valley Water Board prior to initiation of project activities. There are no waivers for 401 Water Quality Certifications.

Waste Discharge Requirements – Discharges to Waters of the State

If USACOE determines that only non-jurisdictional waters of the State (i.e., "non-federal" waters of the State) are present in the proposed project area, the proposed project may require a Waste Discharge Requirement (WDR) permit to be issued by Central Valley Water Board. Under the California Porter-Cologne Water Quality Control Act, discharges to all waters of the State, including all wetlands and other waters of the State including, but not limited to, isolated wetlands, are subject to State regulation.

For more information on the Water Quality Certification and WDR processes, visit the Central Valley Water Board website at:
http://www.waterboards.ca.gov/centralvalley/help/business_help/permit2.shtml.

Dewatering Permit

If the proposed project includes construction or groundwater dewatering to be discharged to land, the proponent may apply for coverage under State Water Board General Water Quality Order (Low Risk General Order) 2003-0003 or the Central Valley Water Board's Waiver of Report of Waste Discharge and Waste Discharge Requirements (Low Risk Waiver) R5-2013-0145. Small temporary construction dewatering projects are projects that discharge groundwater to land from excavation activities or dewatering of underground utility vaults. Dischargers seeking coverage under the General Order or Waiver must file a Notice of Intent with the Central Valley Water Board prior to beginning discharge.

For more information regarding the Low Risk General Order and the application process, visit the Central Valley Water Board website at:

http://www.waterboards.ca.gov/board_decisions/adopted_orders/water_quality/2003/wqo/wqo2003-0003.pdf

For more information regarding the Low Risk Waiver and the application process, visit the Central Valley Water Board website at:

http://www.waterboards.ca.gov/centralvalley/board_decisions/adopted_orders/waivers/r5-2013-0145_res.pdf

Regulatory Compliance for Commercially Irrigated Agriculture

If the property will be used for commercial irrigated agricultural, the discharger will be required to obtain regulatory coverage under the Irrigated Lands Regulatory Program. There are two options to comply:

1. **Obtain Coverage Under a Coalition Group.** Join the local Coalition Group that supports land owners with the implementation of the Irrigated Lands Regulatory Program. The Coalition Group conducts water quality monitoring and reporting to the Central Valley Water Board on behalf of its growers. The Coalition Groups charge an annual membership fee, which varies by Coalition Group. To find the Coalition Group in your area, visit the Central Valley Water Board's website at: http://www.waterboards.ca.gov/centralvalley/water_issues/irrigated_lands/app_approval/index.shtml; or contact water board staff at (916) 464-4611 or via email at IrrLands@waterboards.ca.gov.

2. **Obtain Coverage Under the General Waste Discharge Requirements for Individual Growers, General Order R5-2013-0100**. Dischargers not participating in a third-party group (Coalition) are regulated individually. Depending on the specific site conditions, growers may be required to monitor runoff from their property, install monitoring wells, and submit a notice of intent, farm plan, and other action plans regarding their actions to comply with their General Order. Yearly costs would include State administrative fees (for example, annual fees for farm sizes from 10-100 acres are currently $1,084 + $6.70/Acre); the cost to prepare annual monitoring reports; and water quality monitoring costs. To enroll as an Individual Discharger under the Irrigated Lands Regulatory Program, call the Central Valley Water Board phone line at (916) 464-4611 or e-mail board staff at IrrLands@waterboards.ca.gov.

Low or Limited Threat General NPDES Permit

If the proposed project includes construction dewatering and it is necessary to discharge the groundwater to waters of the United States, the proposed project will require coverage under a National Pollutant Discharge Elimination System (NPDES) permit. Dewatering discharges are typically considered a low or limited threat to water quality and may be covered under the General Order for *Dewatering and Other Low Threat Discharges to Surface Waters* (Low Threat General Order) or the General Order for *Limited Threat Discharges of Treated/Untreated Groundwater from Cleanup Sites, Wastewater from Superchlorination Projects, and Other Limited Threat Wastewaters to Surface Water* (Limited Threat General Order). A complete application must be submitted to the Central Valley Water Board to obtain coverage under these General NPDES permits.

For more information regarding the Low Threat General Order and the application process, visit the Central Valley Water Board website at:
http://www.waterboards.ca.gov/centralvalley/board_decisions/adopted_orders/general_orders/r5-2013-0074.pdf

For more information regarding the Limited Threat General Order and the application process, visit the Central Valley Water Board website at:
http://www.waterboards.ca.gov/centralvalley/board_decisions/adopted_orders/general_orders/r5-2013-0073.pdf

If you have questions regarding these comments, please contact me at (916) 464-4644 or Stephanie.Tadlock@waterboards.ca.gov.

Stephanie Tadlock

Stephanie Tadlock
Environmental Scientist

cc: State Clearinghouse unit, Governor's Office of Planning and Research, Sacramento

FEATHER RIVER AIR QUALITY MANAGEMENT DISTRICT
Serving Sutter and Yuba Counties

541 Washington Avenue
Yuba City, CA 95991
(530) 634-7659
FAX (530) 634-7660
www.fraqmd.org

Christopher D. Brown, AICP
Air Pollution Control Officer

February 18, 2016

Danelle Stylos, Director
Sutter County Development Services Department
1130 Civic Center Blvd. Suite A
Yuba City, CA 95993
Fax: 822-7109

Re: Notice of Preparation EIR for Sutter Pointe Regional Wastewater Conveyance Project.

Dear Danelle Stylos,

Feather River Air Quality Management District appreciates the opportunity to review and comment on the above referenced project. The project may generate emissions during both the construction and operational phases and the District recommends that the EIR include the estimated emissions from both phases. If either phase exceeds the District's thresholds of significance then all feasible mitigation measures should be incorporated. The District has adopted guidance and thresholds of significance which are available here: http://www.fraqmd.org/CEQA%20Planning.html

The operational phase may also include engines or equipment that require an Authority to Construct/Permit to Operate from the District. A list of equipment that commonly requires a Permit from the District is attached. Should any of this equipment be utilized the District would serve as a responsible agency. Please contact Emmanuel Orozco, Air Quality Engineer, at (530) 634-7659 ext 208 for questions regarding Permits.

Sincerely,

Sondra Spaethe

Sondra Spaethe
Air Quality Planner
(530) 634-7659 ext 210

Enclosures: Equipment/Businesses Likely To Require an Air Quality Permit

Equipment and Businesses Likely to Require an Air Quality Permit

Typical equipment and processes requiring a permit:

Stationary fuel burning engines
External combustion devices including boilers, heaters, and incinerators
Equipment or processes emitting respirable particulate matter
Operations emitting volatile organic compounds or using air emissions control devices
Paint, adhesive or solvent spraying operations, auto body refinishing, and paint booths
Abrasive blasting operations
Metal plating operations
Retail and bulk gasoline stations or terminals
Dry cleaning operations
Contaminated soil/water remediation projects
Solid waste disposal facilities
Printing and graphic arts operations
Methyl bromide fumigation (except ag soil applications and housing)
Coating of wood, metal, plastic, glass parts and products
Ethylene oxide sterilizers
Equipment handling asbestos, beryllium, hexavalent chromium
Paint stripping operations and solvent cleaning operations
Equipment handling benzene, mercury or vinyl chloride
Fiberglass/plastic operations
Asphalt, concrete, rock or gravel operations

Businesses that typically require a permit to operate:

Gasoline retail, bulk stations and terminals
Dry cleaners using volatile organic compounds
Electric generation or co-generation plants
Facilities with electric or steam generators or boilers
Wood furniture shops applying or stripping coatings
Cabinet shops applying coatings
Wood pulping operations
Wood sawing, molding, hogging, pressing, treating operations
Plastic parts/products manufacturing
Any facility using air emissions control equipment
Leather tanning shops
Metal plating shops
Rice or bean cleaning and drying operations and nut processing facilities
Cotton gins
Fruit or vegetable dehydration, juicing, or concentrating operations
Paint manufacturing facilities and auto body paint shops
Solvent degreasing operations
Hospitals with emergency generators or boilers
Medical facilities using ethylene oxide for sterilization
Large printing operations and graphic arts operations
Communications industry emergency generators
Chemical manufacturing or repackaging facilities
Micro-brewery / winery
Solid waste landfills
Asphalt, concrete, rock or gravel manufacturing/processing/mining
Fumigation Chambers

From: Danelle Stylos
To: Catherine McEfee
Cc: Doug Libby; Daniel Dameron
Subject: FW: NOP of EIR for Regional Wastewater Conveyance Project - Sutter County
Date: Thursday, February 18, 2016 2:39:24 PM

Cathy,

For the Sutter Pointe project.

Danelle

Danelle Stylos
Development Services Director
Sutter County Development Services
1130 Civic Center Blvd, Suite A
Yuba City, CA 95993
(530) 822-7400

From: Darrow. Matthew [mailto:DarrowM@SacCounty.NET]
Sent: Thursday, February 18, 2016 1:53 PM
To: Danelle Stylos <dstylos@co.sutter.ca.us>
Cc: Frausto. Myriam <fraustom@SacCounty.NET>
Subject: NOP of EIR for Regional Wastewater Conveyance Project - Sutter County

Danelle,
At this time I wanted to send you the following comment.

All construction of the force mains within the County right-of-way will require encroachment permit approval from the County and have to meet the requirements of the permit.

Also, someone in our department noted the following.

Several PER staff members were just discussing the Sutter Point Regional Wastewater Conveyance Project NOP I distributed last week, and noticed that it is fairly close to the Rio Linda Boulevard over North Channel Dry Creek Bridge Replacement Project. This is a SacDOT project with an intended construction start date of spring 2017. Just in case the road construction for the above referenced Sutter County project may have the potential to impact or conflict with construction of the new bridge, I thought I'd mention it to those of you who are reviewing the NOP.

Myriam Frausto is the SacDOT project manager for the bridge replacement project (copied). She should be able to answer any questions you have about the project and associated road detour.

At some point it may be a good idea to coordinate with the project manager for that bridge replacement project.

Thanks,
Matt Darrow

REGIONALSAN
TAKING THE WASTE OUT OF WATER
Sacramento Regional County Sanitation District

Main Office
10060 Goethe Road
Sacramento, CA 95827-3553
Tel: 916.876.6000
Fax: 916.876.6160

Treatment Plant
8521 Laguna Station Road
Elk Grove, CA 95758-9550
Tel: 916.875.9000
Fax: 916.875.9068

www.srcsd.com

February 3, 2016

Danielle Stylos
Director
Sutter County Development Services Department
1130 Civic Center Blvd. Ste A
Yuba City, CA 95993

Subject: Notice of Preparation – Environmental Impact Report for Sutter Pointe Regional Wastewater Conveyance Project

Dear Ms. Stylos:

The Sacramento County Regional Sanitation District (Regional San) and the Sacramento Area Sewer District (SASD) have the following comments regarding the Notice of Preparation for the Draft Environmental Impact Report for the Sutter Pointe Regional Wastewater Conveyance Project:

Regional San will not extend wastewater services to Sutter County. Regional San will provide wastewater services to the Sutter Pointe Specific Plan Area (SPSP) through a connection on the Upper Northwest Interceptor (UNWI). Wastewater from the UNWI interceptor will then flow to the Sacramento Regional Wastewater Treatment Plant (SRWTP) for treatment and disposal. Service is to be provided to the SPSP project area in accordance with the proposed Sutter Pointe Wastewater Service by Contract and Operating Agreement between Sutter County, Regional San, and the Sacramento Area Sewer District (SASD).

SASD and Regional San are not land-use authorities. Projects identified within Regional San and SASD planning documents are based on growth projections provided by land-use authorities. Onsite and offsite impacts associated with constructing sanitary sewers facilities to provide service to the subject project must be included in this, or subsequent environmental impact reports.

The SRWTP provides secondary treatment using an activated sludge process. Incoming wastewater flows through mechanical bar screens through a primary sedimentation process. This allows most of the heavy organic solids to settle to the bottom of the tanks. These solids are later delivered to the digesters. Next, oxygen is added to the wastewater to grow naturally occurring microscopic organisms, which consume the organic particles in the wastewater. These organisms eventually settle on the bottom of the secondary clarifiers. Clean water pours off the top of these clarifiers and is chlorinated, removing any pathogens or other harmful organisms that may still exist. Chlorine disinfection occurs while the wastewater travels through a two-mile "outfall" pipeline to the Sacramento River, near the town of Freeport, California. Before entering the river, sulfur dioxide is added to neutralize the chlorine.

The design of the SRWTP and collection system was balanced to have SRWTP facilities accommodate some of the wet weather flows while minimizing idle SRWTP facilities during dry weather. The SRWTP was designed to accommodate some wet weather flows while the storage basins and interceptors were designed to accommodate the remaining wet weather flows.

An NPDES Discharge Permit was issued to Regional San by the Central Valley Regional Water Quality Control Board (Water Board) in December 2010. In adopting the new Discharge Permit, the Water Board required Regional San to meet significantly more restrictive treatment levels over its current levels. Regional San began the necessary activities, studies, and projects to meet the permit conditions in August of 2014. Regional San must complete construction of the new treatment facilities to achieve the permit and settlement requirements by May 2021 for ammonia and nitrate and May 2023 to meet these pathogen requirements.

Regional San currently owns and operates a 5-mgd Water Reclamation (WRF) that has been producing Title 22 tertiary recycled since 2003. The WRF is located within the SRWTP property in Elk Grove. A portion of the recycled water is used by Regional San at the SRWTP and the rest is wholesaled to the Sacramento County Water Agency (SCWA). SCWA retails the recycled water, primarily for landscape irrigation use, to select customers in the City of Elk Grove. It should be noted that Regional San currently does not have any planned facilities that could provide recycled water to the proposed project or its vicinity. Additionally, Regional San is not a water purveyor and any potential use of recycled water in the project area must be coordinated between the key stakeholders, e.g. land use jurisdictions, water purveyors, users, and the recycled water producers.

If you have any questions regarding these comments, please contact me at 916-876-9994

Sincerely,

Sarenna Moore

Sarenna Moore
SRCSD/SASD
Policy and Planning

Cc: SRCSD Development Services, SASD Development Services, Michael Meyer, Dave Ocenosak, Christoph Dobson

Department of Community Development
Lori A. Moss, Director

Divisions
Administrative Services
Building Permits & Inspection
Code Enforcement
County Engineering
Planning & Environmental Review

February 22, 2016

Sutter County Development Services Department
ATTN: Danelle Stylos, Director
1130 Civic Center Boulevard, Suite A
Yuba City, CA 95993

Subject: Comments on the Notice of Preparation for Sutter Pointe Regional Wastewater Conveyance Project

Dear Ms. Stylos:

We appreciate the opportunity to comment on the Notice of Preparation for Sutter Pointe Regional Wastewater Conveyance Project (Project). Sacramento County will act as a responsible agency for any encroachment permits or easements that may be needed for construction in public rights of way. We have reviewed the project description and offer the following comments to consider in preparation of the Environmental Impact Report.

The Project would extend wastewater service from the Upper Northwest Interceptor in Sacramento County to the Sutter Pointe Specific Plan (SPSP) area in Sutter County. The offsite alignment of the Sutter Pointe Force Mains would go through the Rio Linda and Elverta communities in unincorporated Sacramento County. These communities are primarily agricultural and agricultural-residential in nature, with the exception of the approved Elverta Specific Plan. The Rio Linda-Elverta Community Plan contains applicable policies related to the provision of public sewer service as well as establishment of a buffer area to transition between urban uses and industrial and agricultural activities along Steelhead Creek. The EIR should include analysis of consistency with the Rio Linda-Elverta Community Plan.

The offsite alignment of the Sutter Pointe Force Mains also traverses through an area that is outside the Sacramento County Urban Policy Area, though the alignment is inside the Urban Services Boundary. The EIR should include analysis of potential growth-inducing impacts associated with the Project, given its offsite alignment location.

If you have any questions regarding these comments, or would like to meet to discuss them further, please contact me at (916) 874-6918.

Sincerely,

Todd Smith
Principal Planner

SACRAMENTO METROPOLITAN
AIR QUALITY
MANAGEMENT DISTRICT

Larry Greene
AIR POLLUTION CONTROL OFFICER

February 12, 2016

SENT VIA EMAIL

Ms. Danelle Stylos, Director
Sutter County Development Services Department
1130 Civic Center Blvd, Suite A
Yuba City, CA 95993

RE: Sutter Pointe Regional Wastewater Conveyance Project Notice of Preparation (SMAQMD# SAC201501580)

Dear Ms. Stylos:

Thank you for providing an opportunity to the Sacramento Metropolitan Air Quality Management District (SMAQMD) to review and comment on the above referenced project. SMAQMD comments are as follows:

1. The SMAQMD Guide to Air Quality Assessment (CEQA Guide) offers guidance for analyzing and mitigating all air quality impacts that may result from the portion of this project that occurs in Sacramento County. The CEQA Guide can be found on our website http://www.airquality.org/ceqa/ceqaguideupdate.shtml

2. Analyze and disclose both construction and operational emissions, including nitrogen oxides (NOx), reactive organic gases (ROG), exhaust and fugitive dust particulate matter (PM10 and PM2.5), greenhouse gas emissions (GHG), toxic air contaminants (TAC) and odors. The SMAQMD provides thresholds to assist with significance determinations for all pollutants of concern which can also be found in the CEQA Guide.

In addition, all projects are subject to any SMAQMD rules or regulations in effect at the time of construction. A list of specific rules is attached for your reference and a complete list of all current SMAQMD rules can be found at www.airquality.org.

Thank you for your consideration of these comments. If there are any questions please contact me at cmcghee@airquality.org or 916-874-4883.

Sincerely,

Charlene McGhee
Associate Air Quality Analyst

Attachment

c: Paul Philley, Sacramento Metropolitan AQMD
Sondra Spaethe, Feather River AQMD

SMAQMD Rules & Regulations Statement (revised 3/12)

*The following statement is recommended as standard condition of approval or construction document language for **all** development projects within the Sacramento Metropolitan Air Quality Management District (SMAQMD):*

All projects are subject to SMAQMD rules in effect at the time of construction. A complete listing of current rules is available at www.airquality.org or by calling 916.874.4800. Specific rules that may relate to construction activities or building design may include, but are not limited to:

Rule 201: General Permit Requirements. Any project that includes the use of equipment capable of releasing emissions to the atmosphere may require permit(s) from SMAQMD prior to equipment operation. The applicant, developer, or operator of a project that includes an emergency generator, boiler, or heater should contact the SMAQMD early to determine if a permit is required, and to begin the permit application process. Portable construction equipment (e.g. generators, compressors, pile drivers, lighting equipment, etc.) with an internal combustion engine over 50 horsepower are required to have a SMAQMD permit or a California Air Resources Board portable equipment registration. Other general types of uses that require a permit include, but are not limited to dry cleaners, gasoline stations, spray booths, and operations that generate airborne particulate emissions.

Rule 403: Fugitive Dust. The developer or contractor is required to control dust emissions from earth moving activities, storage or any other construction activity to prevent airborne dust from leaving the project site.

Rule 414: Water Heaters, Boilers and Process Heaters Rated Less Than 1,000,000 BTU PER Hour. The developer or contractor is required to install water heaters (including residence water heaters), boilers or process heaters that comply with the emission limits specified in the rule.

Rule 417: Wood Burning Appliances. This rule prohibits the installation of any new, permanently installed, indoor or outdoor, uncontrolled fireplaces in new or existing developments.

Rule 442: Architectural Coatings. The developer or contractor is required to use coatings that comply with the volatile organic compound content limits specified in the rule.

Rule 460: Adhesives and Sealants. The developer or contractor is required to use adhesives and sealants that comply with the volatile organic compound content limits specified in the rule.

Rule 902: Asbestos. The developer or contractor is required to notify SMAQMD of any regulated renovation or demolition activity. Rule 902 contains specific requirements for surveying, notification, removal, and disposal of asbestos containing material.
Naturally Occurring Asbestos: The developer or contractor is required to notify SMAQMD of earth moving projects, greater than 1 acre in size in areas "Moderately Likely to Contain Asbestos" within eastern Sacramento County. Asbestos Airborne Toxic Control Measures, Section 93105 & 93106 contain specific requirements for surveying, notification, and handling soil that contains naturally occurring asbestos.

Appendix D

Air Quality Data, Greenhouse Gas Emissions, and Energy Data

ESA

Sutter Pointe Regional Waste Water Conveyance Project TEIR - Pump Station Construction Only

Sacramento Valley Air Basin, Summer

1.0 Project Characteristics

1.1 Land Usage

Land Uses	Size	Metric	Lot Acreage	Floor Surface Area	Population
City Park	51.00	Acre	51.00	2,221,560.00	0

1.2 Other Project Characteristics

Urbanization	Rural	**Wind Speed (m/s)**	3.5	**Precipitation Freq (Days)**	65
Climate Zone	3			**Operational Year**	2016
Utility Company	Pacific Gas & Electric Company				
CO2 Intensity (lb/MWhr)	641.35	**CH4 Intensity (lb/MWhr)**	0.029	**N2O Intensity (lb/MWhr)**	0.006

1.3 User Entered Comments & Non-Default Data

Project Characteristics -

Land Use -

Construction Phase - Construction of the forced main would take at most 8 months to complete

Off-road Equipment - Construction equipment that would be used during the construction of the forced main

Trips and VMT - Adjusted worker and ventor trips

Grading -

Construction Off-road Equipment Mitigation -

Off-road Equipment - Equipment used over a eight month duration

Off-road Equipment - Equipment used over a two month duration

Off-road Equipment - Equipment used over a one month duration

Off-road Equipment - Equipment used over a two week duration.

Off-road Equipment - Equipment used over a one week duration.

Table Name	Column Name	Default Value	New Value
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tblConstructionPhase	NumDays	1,110.00	5.00
tblConstructionPhase	PhaseEndDate	3/2/2017	6/30/2016
tblConstructionPhase	PhaseEndDate	8/1/2016	5/31/2016
tblConstructionPhase	PhaseEndDate	6/14/2016	5/13/2016
tblConstructionPhase	PhaseEndDate	5/20/2016	5/6/2016
tblConstructionPhase	PhaseStartDate	12/31/2016	5/1/2016
tblConstructionPhase	PhaseStartDate	7/1/2016	5/1/2016
tblConstructionPhase	PhaseStartDate	6/1/2016	5/1/2016
tblConstructionPhase	PhaseStartDate	5/14/2016	5/1/2016
tblOffRoadEquipment	HorsePower	97.00	98.00

tblOffRoadEquipment	HorsePower	125.00	126.00
tblOffRoadEquipment	HorsePower	80.00	81.00
tblOffRoadEquipment	OffRoadEquipmentType	Cranes	Pumps
tblOffRoadEquipment	OffRoadEquipmentType	Cranes	Plate Compactors
tblOffRoadEquipment	OffRoadEquipmentType	Cranes	Pavers
tblOffRoadEquipment	OffRoadEquipmentType	Forklifts	Rollers
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tblOffRoadEquipment	OffRoadEquipmentUnitAmount	3.00	2.00
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tblOffRoadEquipment	OffRoadEquipmentUnitAmount	0.00	2.00
tblOffRoadEquipment	OffRoadEquipmentUnitAmount	0.00	2.00
tblOffRoadEquipment	OffRoadEquipmentUnitAmount	0.00	2.00
tblOffRoadEquipment	OffRoadEquipmentUnitAmount	3.00	2.00
tblOffRoadEquipment	PhaseName		Pump Station - 2 Mo. Duration
tblOffRoadEquipment	PhaseName		Pump Station - 1 Mo. Duration
tblOffRoadEquipment	PhaseName		Pump Station - 8 Mo. Duration
tblOffRoadEquipment	PhaseName		Pump Station - 1 Wk. Duration
tblOffRoadEquipment	PhaseName		Pump Station - 1 Wk. Duration
tblOffRoadEquipment	UsageHours	7.00	4.00
tblOffRoadEquipment	UsageHours	7.00	8.00
tblProjectCharacteristics	OperationalYear	2014	2016
tblProjectCharacteristics	UrbanizationLevel	Urban	Rural
tblTripsAndVMT	VendorTripNumber	364.00	2.00
tblTripsAndVMT	VendorTripNumber	364.00	0.00
tblTripsAndVMT	VendorTripNumber	364.00	0.00
tblTripsAndVMT	VendorTripNumber	364.00	0.00
tblTripsAndVMT	VendorTripNumber	364.00	0.00

tblTripsAndVMT	WorkerTripNumber	933.00	12.00
tblTripsAndVMT	WorkerTripNumber	933.00	0.00
tblTripsAndVMT	WorkerTripNumber	933.00	0.00
tblTripsAndVMT	WorkerTripNumber	933.00	0.00
tblTripsAndVMT	WorkerTripNumber	933.00	0.00

2.0 Emissions Summary

2.1 Overall Construction (Maximum Daily Emission)

Unmitigated Construction

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year	lb/day										lb/day					
2016	9.2107	78.9402	60.0065	0.0886	0.1653	5.1548	5.3201	0.0441	4.9692	5.0133	0.0000	8,651.3360	8,651.3360	1.5152	0.0000	8,683.1544
Total	**9.2107**	**78.9402**	**60.0065**	**0.0886**	**0.1653**	**5.1548**	**5.3201**	**0.0441**	**4.9692**	**5.0133**	**0.0000**	**8,651.3360**	**8,651.3360**	**1.5152**	**0.0000**	**8,683.1544**

Mitigated Construction

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year	lb/day										lb/day					
2016	9.2107	78.9402	60.0065	0.0886	0.1653	5.1548	5.3201	0.0441	4.9692	5.0133	0.0000	8,651.3360	8,651.3360	1.5152	0.0000	8,683.1544
Total	**9.2107**	**78.9402**	**60.0065**	**0.0886**	**0.1653**	**5.1548**	**5.3201**	**0.0441**	**4.9692**	**5.0133**	**0.0000**	**8,651.3360**	**8,651.3360**	**1.5152**	**0.0000**	**8,683.1544**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio-CO2	Total CO2	CH4	N20	CO2e
Percent Reduction	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**

2.2 Overall Operational

Unmitigated Operational

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Area	61.6473	5.0000e-005	5.3400e-003	0.0000		2.0000e-005	2.0000e-005		2.0000e-005	2.0000e-005		0.0112	0.0112	3.0000e-005		0.0118
Energy	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000
Mobile	0.3886	0.8729	3.7647	6.8300e-003	0.4253	0.0121	0.4374	0.1138	0.0111	0.1249		599.6645	599.6645	0.0236		600.1604
Total	**62.0359**	**0.8729**	**3.7700**	**6.8300e-003**	**0.4253**	**0.0121**	**0.4374**	**0.1138**	**0.0111**	**0.1249**		**599.6757**	**599.6757**	**0.0236**	**0.0000**	**600.1722**

Mitigated Operational

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Area	61.6473	5.0000e-005	5.3400e-003	0.0000		2.0000e-005	2.0000e-005		2.0000e-005	2.0000e-005		0.0112	0.0112	3.0000e-005		0.0118
Energy	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000
Mobile	0.3886	0.8729	3.7647	6.8300e-003	0.4253	0.0121	0.4374	0.1138	0.0111	0.1249		599.6645	599.6645	0.0236		600.1604
Total	**62.0359**	**0.8729**	**3.7700**	**6.8300e-003**	**0.4253**	**0.0121**	**0.4374**	**0.1138**	**0.0111**	**0.1249**		**599.6757**	**599.6757**	**0.0236**	**0.0000**	**600.1722**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio-CO2	Total CO2	CH4	N20	CO2e
Percent Reduction	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

3.0 Construction Detail

Construction Phase

Phase Number	Phase Name	Phase Type	Start Date	End Date	Num Days Week	Num Days	Phase Description
1	Pump Station - 8 Mo. Duration	Building Construction	5/1/2016	12/30/2016	5	175	
2	Pump Station - 2 Mo. Duration	Building Construction	5/1/2016	6/30/2016	5	44	
3	Pump Station - 1 Mo. Duration	Building Construction	5/1/2016	5/31/2016	5	22	
4	Pump Station - 2 Wk. Duration	Building Construction	5/1/2016	5/13/2016	5	10	
5	Pump Station - 1 Wk. Duration	Building Construction	5/1/2016	5/6/2016	5	5	

Acres of Grading (Site Preparation Phase): 0

Acres of Grading (Grading Phase): 0

Acres of Paving: 0

Residential Indoor: 0; Residential Outdoor: 0; Non-Residential Indoor: 0; Non-Residential Outdoor: 0 (Architectural Coating – sqft)

OffRoad Equipment

Phase Name	Offroad Equipment Type	Amount	Usage Hours	Horse Power	Load Factor
Pump Station - 8 Mo. Duration	Generator Sets	2	8.00	84	0.74
Pump Station - 2 Mo. Duration	Pumps	2	24.00	84	0.74
Pump Station - 1 Mo. Duration	Plate Compactors	2	8.00	8	0.43
Pump Station - 8 Mo. Duration	Rubber Tired Dozers	2	4.00	255	0.40
Pump Station - 8 Mo. Duration	Tractors/Loaders/Backhoes	2	4.00	98	0.37
Pump Station - 1 Wk. Duration	Pavers	2	8.00	126	0.42
Pump Station - 1 Wk. Duration	Rollers	2	8.00	81	0.38
Pump Station - 2 Wk. Duration	Tractors/Loaders/Backhoes	2	8.00	97	0.37

Trips and VMT

Phase Name	Offroad Equipment Count	Worker Trip Number	Vendor Trip Number	Hauling Trip Number	Worker Trip Length	Vendor Trip Length	Hauling Trip Length	Worker Vehicle Class	Vendor Vehicle Class	Hauling Vehicle Class
Pump Station - 8 Mo. Duration	6	12.00	2.00	0.00	16.80	6.60	20.00	LD_Mix	HDT_Mix	HHDT
Pump Station - 2 Mo. Duration	2	0.00	0.00	0.00	16.80	6.60	20.00	LD_Mix	HDT_Mix	HHDT
Pump Station - 1 Mo. Duration	2	0.00	0.00	0.00	16.80	6.60	20.00	LD_Mix	HDT_Mix	HHDT
Pump Station - 2 Wk. Duration	2	0.00	0.00	0.00	16.80	6.60	20.00	LD_Mix	HDT_Mix	HHDT
Pump Station - 1 Wk. Duration	4	0.00	0.00	0.00	16.80	6.60	20.00	LD_Mix	HDT_Mix	HHDT

3.1 Mitigation Measures Construction

Use Soil Stabilizer

Water Exposed Area

Reduce Vehicle Speed on Unpaved Roads

3.2 Pump Station - 8 Mo. Duration - 2016

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	2.8606	26.8288	20.5287	0.0252		1.5761	1.5761		1.5042	1.5042		2,496.5153	2,496.5153	0.4912		2,506.8305
Total	**2.8606**	**26.8288**	**20.5287**	**0.0252**		**1.5761**	**1.5761**		**1.5042**	**1.5042**		**2,496.5153**	**2,496.5153**	**0.4912**		**2,506.8305**

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0241	0.1655	0.2553	4.3000e-004	0.0120	2.7700e-003	0.0148	3.4200e-003	2.5400e-003	5.9700e-003		43.2978	43.2978	3.4000e-004		43.3050
Worker	0.0613	0.0758	0.9753	1.9400e-003	0.1533	1.0900e-003	0.1544	0.0407	1.0000e-003	0.0417		159.6769	159.6769	7.7700e-003		159.8400
Total	**0.0853**	**0.2413**	**1.2305**	**2.3700e-003**	**0.1653**	**3.8600e-003**	**0.1691**	**0.0441**	**3.5400e-003**	**0.0476**		**202.9747**	**202.9747**	**8.1100e-003**		**203.1450**

3.2 Pump Station - 8 Mo. Duration - 2016

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	2.8606	26.8288	20.5287	0.0252		1.5761	1.5761		1.5042	1.5042	0.0000	2,496.5153	2,496.5153	0.4912		2,506.8305
Total	**2.8606**	**26.8288**	**20.5287**	**0.0252**		**1.5761**	**1.5761**		**1.5042**	**1.5042**	**0.0000**	**2,496.5153**	**2,496.5153**	**0.4912**		**2,506.8305**

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0241	0.1655	0.2553	4.3000e-004	0.0120	2.7700e-003	0.0148	3.4200e-003	2.5400e-003	5.9700e-003		43.2978	43.2978	3.4000e-004		43.3050
Worker	0.0613	0.0758	0.9753	1.9400e-003	0.1533	1.0900e-003	0.1544	0.0407	1.0000e-003	0.0417		159.6769	159.6769	7.7700e-003		159.8400
Total	**0.0853**	**0.2413**	**1.2305**	**2.3700e-003**	**0.1653**	**3.8600e-003**	**0.1691**	**0.0441**	**3.5400e-003**	**0.0476**		**202.9747**	**202.9747**	**8.1100e-003**		**203.1450**

3.3 Pump Station - 2 Mo. Duration - 2016

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	4.0125	29.4558	23.1739	0.0395		2.1378	2.1378		2.1378	2.1378		3,738.2074	3,738.2074	0.3618		3,745.8049
Total	**4.0125**	**29.4558**	**23.1739**	**0.0395**		**2.1378**	**2.1378**		**2.1378**	**2.1378**		**3,738.2074**	**3,738.2074**	**0.3618**		**3,745.8049**

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**		**0.0000**

3.3 Pump Station - 2 Mo. Duration - 2016

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	4.0125	29.4558	23.1739	0.0395		2.1378	2.1378		2.1378	2.1378	0.0000	3,738.2074	3,738.2074	0.3618		3,745.8049
Total	**4.0125**	**29.4558**	**23.1739**	**0.0395**		**2.1378**	**2.1378**		**2.1378**	**2.1378**	**0.0000**	**3,738.2074**	**3,738.2074**	**0.3618**		**3,745.8049**

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**		**0.0000**

3.4 Pump Station - 1 Mo. Duration - 2016

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	0.0802	0.5026	0.4209	9.7000e-004		0.0195	0.0195		0.0195	0.0195		68.9588	68.9588	7.1600e-003		69.1091
Total	**0.0802**	**0.5026**	**0.4209**	**9.7000e-004**		**0.0195**	**0.0195**		**0.0195**	**0.0195**		**68.9588**	**68.9588**	**7.1600e-003**		**69.1091**

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**		**0.0000**

3.4 Pump Station - 1 Mo. Duration - 2016

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	0.0802	0.5026	0.4209	9.7000e-004		0.0195	0.0195		0.0195	0.0195	0.0000	68.9588	68.9588	7.1600e-003		69.1091
Total	**0.0802**	**0.5026**	**0.4209**	**9.7000e-004**		**0.0195**	**0.0195**		**0.0195**	**0.0195**	**0.0000**	**68.9588**	**68.9588**	**7.1600e-003**		**69.1091**

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**		**0.0000**

3.5 Pump Station - 2 Wk. Duration - 2016

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	0.6812	6.5101	4.8252	6.2300e-003		0.5012	0.5012		0.4611	0.4611		647.3546	647.3546	0.1953		651.4551
Total	**0.6812**	**6.5101**	**4.8252**	**6.2300e-003**		**0.5012**	**0.5012**		**0.4611**	**0.4611**		**647.3546**	**647.3546**	**0.1953**		**651.4551**

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**		**0.0000**

3.5 Pump Station - 2 Wk. Duration - 2016

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	0.6812	6.5101	4.8252	6.2300e-003		0.5012	0.5012		0.4611	0.4611	0.0000	647.3546	647.3546	0.1953		651.4551
Total	**0.6812**	**6.5101**	**4.8252**	**6.2300e-003**		**0.5012**	**0.5012**		**0.4611**	**0.4611**	**0.0000**	**647.3546**	**647.3546**	**0.1953**		**651.4551**

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**		**0.0000**

3.6 Pump Station - 1 Wk. Duration - 2016

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	1.4908	15.4016	9.8272	0.0144		0.9163	0.9163		0.8430	0.8430		1,497.3253	1,497.3253	0.4517		1,506.8099
Total	**1.4908**	**15.4016**	**9.8272**	**0.0144**		**0.9163**	**0.9163**		**0.8430**	**0.8430**		**1,497.3253**	**1,497.3253**	**0.4517**		**1,506.8099**

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**		**0.0000**

3.6 Pump Station - 1 Wk. Duration - 2016

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	1.4908	15.4016	9.8272	0.0144		0.9163	0.9163		0.8430	0.8430	0.0000	1,497.3253	1,497.3253	0.4517		1,506.8099
Total	**1.4908**	**15.4016**	**9.8272**	**0.0144**		**0.9163**	**0.9163**		**0.8430**	**0.8430**	**0.0000**	**1,497.3253**	**1,497.3253**	**0.4517**		**1,506.8099**

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**		**0.0000**

4.0 Operational Detail - Mobile

4.1 Mitigation Measures Mobile

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Mitigated	0.3886	0.8729	3.7647	6.8300e-003	0.4253	0.0121	0.4374	0.1138	0.0111	0.1249		599.6645	599.6645	0.0236		600.1604
Unmitigated	0.3886	0.8729	3.7647	6.8300e-003	0.4253	0.0121	0.4374	0.1138	0.0111	0.1249		599.6645	599.6645	0.0236		600.1604

4.2 Trip Summary Information

	Average Daily Trip Rate			Unmitigated	Mitigated
Land Use	Weekday	Saturday	Sunday	Annual VMT	Annual VMT
City Park	81.09	81.09	81.09	199,985	199,985
Total	81.09	81.09	81.09	199,985	199,985

4.3 Trip Type Information

	Miles			Trip %			Trip Purpose %		
Land Use	H-W or C-W	H-S or C-C	H-O or C-NW	H-W or C-W	H-S or C-C	H-O or C-NW	Primary	Diverted	Pass-by
City Park	14.70	6.60	6.60	33.00	48.00	19.00	66	28	6

LDA	LDT1	LDT2	MDV	LHD1	LHD2	MHD	HHD	OBUS	UBUS	MCY	SBUS	MH
0.462992	0.061838	0.181170	0.154683	0.057449	0.007359	0.019227	0.041233	0.001831	0.001687	0.006984	0.000699	0.002847

4.4 Fleet Mix

5.0 Energy Detail

Historical Energy Use: N

5.1 Mitigation Measures Energy

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
NaturalGas Mitigated	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000
NaturalGas Unmitigated	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000

5.2 Energy by Land Use - NaturalGas

Unmitigated

	NaturalGas Use	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Land Use	kBTU/yr	lb/day										lb/day					
City Park	0	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000
Total		**0.0000**	**0.0000**	**0.0000**	**0.0000**		**0.0000**	**0.0000**		**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**

5.2 Energy by Land Use - NaturalGas

Mitigated

	NaturalGas Use	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Land Use	kBTU/yr	lb/day										lb/day					
City Park	0	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000
Total		**0.0000**	**0.0000**	**0.0000**	**0.0000**		**0.0000**	**0.0000**		**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**

6.0 Area Detail

6.1 Mitigation Measures Area

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Mitigated	61.6473	5.0000e-005	5.3400e-003	0.0000		2.0000e-005	2.0000e-005		2.0000e-005	2.0000e-005		0.0112	0.0112	3.0000e-005		0.0118
Unmitigated	61.6473	5.0000e-005	5.3400e-003	0.0000		2.0000e-005	2.0000e-005		2.0000e-005	2.0000e-005		0.0112	0.0112	3.0000e-005		0.0118

6.2 Area by SubCategory

Unmitigated

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
SubCategory	lb/day										lb/day					
Architectural Coating	14.1054					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Consumer Products	47.5414					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Landscaping	5.2000e-004	5.0000e-005	5.3400e-003	0.0000		2.0000e-005	2.0000e-005		2.0000e-005	2.0000e-005		0.0112	0.0112	3.0000e-005		0.0118
Total	**61.6473**	**5.0000e-005**	**5.3400e-003**	**0.0000**		**2.0000e-005**	**2.0000e-005**		**2.0000e-005**	**2.0000e-005**		**0.0112**	**0.0112**	**3.0000e-005**		**0.0118**

Mitigated

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
SubCategory	lb/day										lb/day					
Architectural Coating	14.1054					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Consumer Products	47.5414					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Landscaping	5.2000e-004	5.0000e-005	5.3400e-003	0.0000		2.0000e-005	2.0000e-005		2.0000e-005	2.0000e-005		0.0112	0.0112	3.0000e-005		0.0118
Total	**61.6473**	**5.0000e-005**	**5.3400e-003**	**0.0000**		**2.0000e-005**	**2.0000e-005**		**2.0000e-005**	**2.0000e-005**		**0.0112**	**0.0112**	**3.0000e-005**		**0.0118**

7.0 Water Detail

7.1 Mitigation Measures Water

8.0 Waste Detail

8.1 Mitigation Measures Waste

9.0 Operational Offroad

Equipment Type	Number	Hours/Day	Days/Year	Horse Power	Load Factor	Fuel Type

10.0 Vegetation

Sutter Pointe Regional Waste Water Conveyance Project TEIR - Pump Station Construction Only

Sacramento Valley Air Basin, Annual

1.0 Project Characteristics

1.1 Land Usage

Land Uses	Size	Metric	Lot Acreage	Floor Surface Area	Population
City Park	51.00	Acre	51.00	2,221,560.00	0

1.2 Other Project Characteristics

Urbanization	Rural	**Wind Speed (m/s)**	3.5	**Precipitation Freq (Days)**	65
Climate Zone	3			**Operational Year**	2016
Utility Company	Pacific Gas & Electric Company				
CO2 Intensity (lb/MWhr)	641.35	**CH4 Intensity (lb/MWhr)**	0.029	**N2O Intensity (lb/MWhr)**	0.006

1.3 User Entered Comments & Non-Default Data

Project Characteristics -

Land Use -

Construction Phase - Construction of the forced main would take at most 8 months to complete

Off-road Equipment - Construction equipment that would be used during the construction of the forced main

Trips and VMT - Adjusted worker and ventor trips

Grading -

Construction Off-road Equipment Mitigation -

Off-road Equipment - Equipment used over a eight month duration

Off-road Equipment - Equipment used over a two month duration

Off-road Equipment - Equipment used over a one month duration

Off-road Equipment - Equipment used over a two week duration.

Off-road Equipment - Equipment used over a one week duration.

Table Name	Column Name	Default Value	New Value
tblConstructionPhase	NumDays	1,110.00	175.00
tblConstructionPhase	NumDays	1,110.00	44.00
tblConstructionPhase	NumDays	1,110.00	22.00
tblConstructionPhase	NumDays	1,110.00	10.00
tblConstructionPhase	NumDays	1,110.00	5.00
tblConstructionPhase	PhaseEndDate	3/2/2017	6/30/2016
tblConstructionPhase	PhaseEndDate	8/1/2016	5/31/2016
tblConstructionPhase	PhaseEndDate	6/14/2016	5/13/2016
tblConstructionPhase	PhaseEndDate	5/20/2016	5/6/2016
tblConstructionPhase	PhaseStartDate	12/31/2016	5/1/2016
tblConstructionPhase	PhaseStartDate	7/1/2016	5/1/2016
tblConstructionPhase	PhaseStartDate	6/1/2016	5/1/2016
tblConstructionPhase	PhaseStartDate	5/14/2016	5/1/2016
tblOffRoadEquipment	HorsePower	97.00	98.00

tblOffRoadEquipment	HorsePower	125.00	126.00
tblOffRoadEquipment	HorsePower	80.00	81.00
tblOffRoadEquipment	OffRoadEquipmentType	Cranes	Pumps
tblOffRoadEquipment	OffRoadEquipmentType	Cranes	Plate Compactors
tblOffRoadEquipment	OffRoadEquipmentType	Cranes	Pavers
tblOffRoadEquipment	OffRoadEquipmentType	Forklifts	Rollers
tblOffRoadEquipment	OffRoadEquipmentUnitAmount	1.00	2.00
tblOffRoadEquipment	OffRoadEquipmentUnitAmount	3.00	2.00
tblOffRoadEquipment	OffRoadEquipmentUnitAmount	0.00	2.00
tblOffRoadEquipment	OffRoadEquipmentUnitAmount	0.00	2.00
tblOffRoadEquipment	OffRoadEquipmentUnitAmount	0.00	2.00
tblOffRoadEquipment	OffRoadEquipmentUnitAmount	0.00	2.00
tblOffRoadEquipment	OffRoadEquipmentUnitAmount	0.00	2.00
tblOffRoadEquipment	OffRoadEquipmentUnitAmount	3.00	2.00
tblOffRoadEquipment	PhaseName		Pump Station - 2 Mo. Duration
tblOffRoadEquipment	PhaseName		Pump Station - 1 Mo. Duration
tblOffRoadEquipment	PhaseName		Pump Station - 8 Mo. Duration
tblOffRoadEquipment	PhaseName		Pump Station - 1 Wk. Duration
tblOffRoadEquipment	PhaseName		Pump Station - 1 Wk. Duration
tblOffRoadEquipment	UsageHours	7.00	4.00
tblOffRoadEquipment	UsageHours	7.00	8.00
tblProjectCharacteristics	OperationalYear	2014	2016
tblProjectCharacteristics	UrbanizationLevel	Urban	Rural
tblTripsAndVMT	VendorTripNumber	364.00	2.00
tblTripsAndVMT	VendorTripNumber	364.00	0.00
tblTripsAndVMT	VendorTripNumber	364.00	0.00
tblTripsAndVMT	VendorTripNumber	364.00	0.00
tblTripsAndVMT	VendorTripNumber	364.00	0.00

tblTripsAndVMT	WorkerTripNumber	933.00	12.00
tblTripsAndVMT	WorkerTripNumber	933.00	0.00
tblTripsAndVMT	WorkerTripNumber	933.00	0.00
tblTripsAndVMT	WorkerTripNumber	933.00	0.00
tblTripsAndVMT	WorkerTripNumber	933.00	0.00

2.0 Emissions Summary

2.1 Overall Construction

Unmitigated Construction

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year	tons/yr										MT/yr					
2016	0.3535	3.0947	2.4591	3.3400e-003	0.0139	0.1903	0.2042	3.7200e-003	0.1836	0.1873	0.0000	294.6956	294.6956	0.0488	0.0000	295.7212
Total	**0.3535**	**3.0947**	**2.4591**	**3.3400e-003**	**0.0139**	**0.1903**	**0.2042**	**3.7200e-003**	**0.1836**	**0.1873**	**0.0000**	**294.6956**	**294.6956**	**0.0488**	**0.0000**	**295.7212**

Mitigated Construction

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year	tons/yr										MT/yr					
2016	0.3535	3.0947	2.4591	3.3400e-003	0.0139	0.1903	0.2042	3.7200e-003	0.1836	0.1873	0.0000	294.6953	294.6953	0.0488	0.0000	295.7208
Total	**0.3535**	**3.0947**	**2.4591**	**3.3400e-003**	**0.0139**	**0.1903**	**0.2042**	**3.7200e-003**	**0.1836**	**0.1873**	**0.0000**	**294.6953**	**294.6953**	**0.0488**	**0.0000**	**295.7208**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio-CO2	Total CO2	CH4	N20	CO2e
Percent Reduction	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**

2.2 Overall Operational

Unmitigated Operational

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Area	11.2506	0.0000	4.8000e-004	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	9.1000e-004	9.1000e-004	0.0000	0.0000	9.7000e-004
Energy	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Mobile	0.0641	0.1703	0.6685	1.1600e-003	0.0745	2.2100e-003	0.0767	0.0200	2.0300e-003	0.0220	0.0000	92.4347	92.4347	3.9000e-003	0.0000	92.5165
Waste						0.0000	0.0000		0.0000	0.0000	0.8911	0.0000	0.8911	0.0527	0.0000	1.9971
Water						0.0000	0.0000		0.0000	0.0000	0.0000	61.8709	61.8709	2.8000e-003	5.8000e-004	62.1091
Total	**11.3147**	**0.1703**	**0.6690**	**1.1600e-003**	**0.0745**	**2.2100e-003**	**0.0767**	**0.0200**	**2.0300e-003**	**0.0220**	**0.8911**	**154.3065**	**155.1976**	**0.0594**	**5.8000e-004**	**156.6236**

2.2 Overall Operational

Mitigated Operational

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Area	11.2506	0.0000	4.8000e-004	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	9.1000e-004	9.1000e-004	0.0000	0.0000	9.7000e-004
Energy	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Mobile	0.0641	0.1703	0.6685	1.1600e-003	0.0745	2.2100e-003	0.0767	0.0200	2.0300e-003	0.0220	0.0000	92.4347	92.4347	3.9000e-003	0.0000	92.5165
Waste						0.0000	0.0000		0.0000	0.0000	0.8911	0.0000	0.8911	0.0527	0.0000	1.9971
Water						0.0000	0.0000		0.0000	0.0000	0.0000	61.8709	61.8709	2.8000e-003	5.8000e-004	62.1091
Total	**11.3147**	**0.1703**	**0.6690**	**1.1600e-003**	**0.0745**	**2.2100e-003**	**0.0767**	**0.0200**	**2.0300e-003**	**0.0220**	**0.8911**	**154.3065**	**155.1976**	**0.0594**	**5.8000e-004**	**156.6236**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio-CO2	Total CO2	CH4	N20	CO2e
Percent Reduction	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**

3.0 Construction Detail

Construction Phase

Phase Number	Phase Name	Phase Type	Start Date	End Date	Num Days Week	Num Days	Phase Description
1	Pump Station - 8 Mo. Duration	Building Construction	5/1/2016	12/30/2016	5	175	
2	Pump Station - 2 Mo. Duration	Building Construction	5/1/2016	6/30/2016	5	44	
3	Pump Station - 1 Mo. Duration	Building Construction	5/1/2016	5/31/2016	5	22	
4	Pump Station - 2 Wk. Duration	Building Construction	5/1/2016	5/13/2016	5	10	
5	Pump Station - 1 Wk. Duration	Building Construction	5/1/2016	5/6/2016	5	5	

Acres of Grading (Site Preparation Phase): 0

Acres of Grading (Grading Phase): 0

Acres of Paving: 0

Residential Indoor: 0; Residential Outdoor: 0; Non-Residential Indoor: 0; Non-Residential Outdoor: 0 (Architectural Coating – sqft)

OffRoad Equipment

Phase Name	Offroad Equipment Type	Amount	Usage Hours	Horse Power	Load Factor
Pump Station - 8 Mo. Duration	Generator Sets	2	8.00	84	0.74
Pump Station - 2 Mo. Duration	Pumps	2	24.00	84	0.74
Pump Station - 1 Mo. Duration	Plate Compactors	2	8.00	8	0.43
Pump Station - 8 Mo. Duration	Rubber Tired Dozers	2	4.00	255	0.40
Pump Station - 8 Mo. Duration	Tractors/Loaders/Backhoes	2	4.00	98	0.37
Pump Station - 1 Wk. Duration	Pavers	2	8.00	126	0.42
Pump Station - 1 Wk. Duration	Rollers	2	8.00	81	0.38
Pump Station - 2 Wk. Duration	Tractors/Loaders/Backhoes	2	8.00	97	0.37

Trips and VMT

Phase Name	Offroad Equipment Count	Worker Trip Number	Vendor Trip Number	Hauling Trip Number	Worker Trip Length	Vendor Trip Length	Hauling Trip Length	Worker Vehicle Class	Vendor Vehicle Class	Hauling Vehicle Class
Pump Station - 8 Mo. Duration	6	12.00	2.00	0.00	16.80	6.60	20.00	LD_Mix	HDT_Mix	HHDT
Pump Station - 2 Mo. Duration	2	0.00	0.00	0.00	16.80	6.60	20.00	LD_Mix	HDT_Mix	HHDT
Pump Station - 1 Mo. Duration	2	0.00	0.00	0.00	16.80	6.60	20.00	LD_Mix	HDT_Mix	HHDT
Pump Station - 2 Wk. Duration	2	0.00	0.00	0.00	16.80	6.60	20.00	LD_Mix	HDT_Mix	HHDT
Pump Station - 1 Wk. Duration	4	0.00	0.00	0.00	16.80	6.60	20.00	LD_Mix	HDT_Mix	HHDT

3.1 Mitigation Measures Construction

Use Soil Stabilizer

Water Exposed Area

Reduce Vehicle Speed on Unpaved Roads

3.2 Pump Station - 8 Mo. Duration - 2016

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	0.2503	2.3475	1.7963	2.2000e-003		0.1379	0.1379		0.1316	0.1316	0.0000	198.1701	198.1701	0.0390	0.0000	198.9889
Total	**0.2503**	**2.3475**	**1.7963**	**2.2000e-003**		**0.1379**	**0.1379**		**0.1316**	**0.1316**	**0.0000**	**198.1701**	**198.1701**	**0.0390**	**0.0000**	**198.9889**

3.2 Pump Station - 8 Mo. Duration - 2016

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	2.3300e-003	0.0152	0.0269	4.0000e-005	1.0200e-003	2.4000e-004	1.2600e-003	2.9000e-004	2.2000e-004	5.2000e-004	0.0000	3.4248	3.4248	3.0000e-005	0.0000	3.4254
Worker	4.5500e-003	7.3900e-003	0.0728	1.5000e-004	0.0129	1.0000e-004	0.0130	3.4300e-003	9.0000e-005	3.5200e-003	0.0000	11.4730	11.4730	6.2000e-004	0.0000	11.4860
Total	**6.8800e-003**	**0.0226**	**0.0997**	**1.9000e-004**	**0.0139**	**3.4000e-004**	**0.0143**	**3.7200e-003**	**3.1000e-004**	**4.0400e-003**	**0.0000**	**14.8978**	**14.8978**	**6.5000e-004**	**0.0000**	**14.9113**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	0.2503	2.3475	1.7963	2.2000e-003		0.1379	0.1379		0.1316	0.1316	0.0000	198.1698	198.1698	0.0390	0.0000	198.9886
Total	**0.2503**	**2.3475**	**1.7963**	**2.2000e-003**		**0.1379**	**0.1379**		**0.1316**	**0.1316**	**0.0000**	**198.1698**	**198.1698**	**0.0390**	**0.0000**	**198.9886**

3.2 Pump Station - 8 Mo. Duration - 2016

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	2.3300e-003	0.0152	0.0269	4.0000e-005	1.0200e-003	2.4000e-004	1.2600e-003	2.9000e-004	2.2000e-004	5.2000e-004	0.0000	3.4248	3.4248	3.0000e-005	0.0000	3.4254
Worker	4.5500e-003	7.3900e-003	0.0728	1.5000e-004	0.0129	1.0000e-004	0.0130	3.4300e-003	9.0000e-005	3.5200e-003	0.0000	11.4730	11.4730	6.2000e-004	0.0000	11.4860
Total	**6.8800e-003**	**0.0226**	**0.0997**	**1.9000e-004**	**0.0139**	**3.4000e-004**	**0.0143**	**3.7200e-003**	**3.1000e-004**	**4.0400e-003**	**0.0000**	**14.8978**	**14.8978**	**6.5000e-004**	**0.0000**	**14.9113**

3.3 Pump Station - 2 Mo. Duration - 2016

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	0.0883	0.6480	0.5098	8.7000e-004		0.0470	0.0470		0.0470	0.0470	0.0000	74.6074	74.6074	7.2200e-003	0.0000	74.7590
Total	**0.0883**	**0.6480**	**0.5098**	**8.7000e-004**		**0.0470**	**0.0470**		**0.0470**	**0.0470**	**0.0000**	**74.6074**	**74.6074**	**7.2200e-003**	**0.0000**	**74.7590**

3.3 Pump Station - 2 Mo. Duration - 2016

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	0.0883	0.6480	0.5098	8.7000e-004		0.0470	0.0470		0.0470	0.0470	0.0000	74.6073	74.6073	7.2200e-003	0.0000	74.7589
Total	**0.0883**	**0.6480**	**0.5098**	**8.7000e-004**		**0.0470**	**0.0470**		**0.0470**	**0.0470**	**0.0000**	**74.6073**	**74.6073**	**7.2200e-003**	**0.0000**	**74.7589**

3.3 Pump Station - 2 Mo. Duration - 2016

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**

3.4 Pump Station - 1 Mo. Duration - 2016

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	8.8000e-004	5.5300e-003	4.6300e-003	1.0000e-005		2.1000e-004	2.1000e-004		2.1000e-004	2.1000e-004	0.0000	0.6881	0.6881	7.0000e-005	0.0000	0.6896
Total	**8.8000e-004**	**5.5300e-003**	**4.6300e-003**	**1.0000e-005**		**2.1000e-004**	**2.1000e-004**		**2.1000e-004**	**2.1000e-004**	**0.0000**	**0.6881**	**0.6881**	**7.0000e-005**	**0.0000**	**0.6896**

3.4 Pump Station - 1 Mo. Duration - 2016

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	8.8000e-004	5.5300e-003	4.6300e-003	1.0000e-005		2.1000e-004	2.1000e-004		2.1000e-004	2.1000e-004	0.0000	0.6881	0.6881	7.0000e-005	0.0000	0.6896
Total	**8.8000e-004**	**5.5300e-003**	**4.6300e-003**	**1.0000e-005**		**2.1000e-004**	**2.1000e-004**		**2.1000e-004**	**2.1000e-004**	**0.0000**	**0.6881**	**0.6881**	**7.0000e-005**	**0.0000**	**0.6896**

3.4 Pump Station - 1 Mo. Duration - 2016

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**

3.5 Pump Station - 2 Wk. Duration - 2016

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	3.4100e-003	0.0326	0.0241	3.0000e-005		2.5100e-003	2.5100e-003		2.3100e-003	2.3100e-003	0.0000	2.9364	2.9364	8.9000e-004	0.0000	2.9550
Total	**3.4100e-003**	**0.0326**	**0.0241**	**3.0000e-005**		**2.5100e-003**	**2.5100e-003**		**2.3100e-003**	**2.3100e-003**	**0.0000**	**2.9364**	**2.9364**	**8.9000e-004**	**0.0000**	**2.9550**

3.5 Pump Station - 2 Wk. Duration - 2016

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	3.4100e-003	0.0326	0.0241	3.0000e-005		2.5100e-003	2.5100e-003		2.3100e-003	2.3100e-003	0.0000	2.9364	2.9364	8.9000e-004	0.0000	2.9550
Total	**3.4100e-003**	**0.0326**	**0.0241**	**3.0000e-005**		**2.5100e-003**	**2.5100e-003**		**2.3100e-003**	**2.3100e-003**	**0.0000**	**2.9364**	**2.9364**	**8.9000e-004**	**0.0000**	**2.9550**

3.5 Pump Station - 2 Wk. Duration - 2016

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**

3.6 Pump Station - 1 Wk. Duration - 2016

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	3.7300e-003	0.0385	0.0246	4.0000e-005		2.2900e-003	2.2900e-003		2.1100e-003	2.1100e-003	0.0000	3.3959	3.3959	1.0200e-003	0.0000	3.4174
Total	**3.7300e-003**	**0.0385**	**0.0246**	**4.0000e-005**		**2.2900e-003**	**2.2900e-003**		**2.1100e-003**	**2.1100e-003**	**0.0000**	**3.3959**	**3.3959**	**1.0200e-003**	**0.0000**	**3.4174**

3.6 Pump Station - 1 Wk. Duration - 2016

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	3.7300e-003	0.0385	0.0246	4.0000e-005		2.2900e-003	2.2900e-003		2.1100e-003	2.1100e-003	0.0000	3.3959	3.3959	1.0200e-003	0.0000	3.4174
Total	**3.7300e-003**	**0.0385**	**0.0246**	**4.0000e-005**		**2.2900e-003**	**2.2900e-003**		**2.1100e-003**	**2.1100e-003**	**0.0000**	**3.3959**	**3.3959**	**1.0200e-003**	**0.0000**	**3.4174**

3.6 Pump Station - 1 Wk. Duration - 2016

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**

4.0 Operational Detail - Mobile

4.1 Mitigation Measures Mobile

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Mitigated	0.0641	0.1703	0.6685	1.1600e-003	0.0745	2.2100e-003	0.0767	0.0200	2.0300e-003	0.0220	0.0000	92.4347	92.4347	3.9000e-003	0.0000	92.5165
Unmitigated	0.0641	0.1703	0.6685	1.1600e-003	0.0745	2.2100e-003	0.0767	0.0200	2.0300e-003	0.0220	0.0000	92.4347	92.4347	3.9000e-003	0.0000	92.5165

4.2 Trip Summary Information

	Average Daily Trip Rate			Unmitigated	Mitigated
Land Use	Weekday	Saturday	Sunday	Annual VMT	Annual VMT
City Park	81.09	81.09	81.09	199,985	199,985
Total	81.09	81.09	81.09	199,985	199,985

4.3 Trip Type Information

	Miles			Trip %			Trip Purpose %		
Land Use	H-W or C-W	H-S or C-C	H-O or C-NW	H-W or C-W	H-S or C-C	H-O or C-NW	Primary	Diverted	Pass-by
City Park	14.70	6.60	6.60	33.00	48.00	19.00	66	28	6

LDA	LDT1	LDT2	MDV	LHD1	LHD2	MHD	HHD	OBUS	UBUS	MCY	SBUS	MH
0.462992	0.061838	0.181170	0.154683	0.057449	0.007359	0.019227	0.041233	0.001831	0.001687	0.006984	0.000699	0.002847

5.0 Energy Detail

4.4 Fleet Mix

Historical Energy Use: N

5.1 Mitigation Measures Energy

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Electricity Mitigated						0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Electricity Unmitigated						0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
NaturalGas Mitigated	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
NaturalGas Unmitigated	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000

5.2 Energy by Land Use - NaturalGas

Unmitigated

	NaturalGas Use	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Land Use	kBTU/yr	tons/yr										MT/yr					
City Park	0	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total		**0.0000**	**0.0000**	**0.0000**	**0.0000**		**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**

5.2 Energy by Land Use - NaturalGas

Mitigated

	NaturalGas Use	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Land Use	kBTU/yr	tons/yr										MT/yr					
City Park	0	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total		**0.0000**	**0.0000**	**0.0000**	**0.0000**		**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**

5.3 Energy by Land Use - Electricity

Unmitigated

	Electricity Use	Total CO2	CH4	N2O	CO2e
Land Use	kWh/yr	MT/yr			
City Park	0	0.0000	0.0000	0.0000	0.0000
Total		**0.0000**	**0.0000**	**0.0000**	**0.0000**

5.3 Energy by Land Use - Electricity

Mitigated

	Electricity Use	Total CO2	CH4	N2O	CO2e
Land Use	kWh/yr	MT/yr			
City Park	0	0.0000	0.0000	0.0000	0.0000
Total		**0.0000**	**0.0000**	**0.0000**	**0.0000**

6.0 Area Detail

6.1 Mitigation Measures Area

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Mitigated	11.2506	0.0000	4.8000e-004	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	9.1000e-004	9.1000e-004	0.0000	0.0000	9.7000e-004
Unmitigated	11.2506	0.0000	4.8000e-004	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	9.1000e-004	9.1000e-004	0.0000	0.0000	9.7000e-004

6.2 Area by SubCategory

Unmitigated

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
SubCategory	tons/yr										MT/yr					
Architectural Coating	2.5742					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Consumer Products	8.6763					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Landscaping	5.0000e-005	0.0000	4.8000e-004	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	9.1000e-004	9.1000e-004	0.0000	0.0000	9.7000e-004
Total	**11.2506**	**0.0000**	**4.8000e-004**	**0.0000**		**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**	**9.1000e-004**	**9.1000e-004**	**0.0000**	**0.0000**	**9.7000e-004**

Mitigated

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
SubCategory	tons/yr										MT/yr					
Architectural Coating	2.5742					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Consumer Products	8.6763					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Landscaping	5.0000e-005	0.0000	4.8000e-004	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	9.1000e-004	9.1000e-004	0.0000	0.0000	9.7000e-004
Total	**11.2506**	**0.0000**	**4.8000e-004**	**0.0000**		**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**	**9.1000e-004**	**9.1000e-004**	**0.0000**	**0.0000**	**9.7000e-004**

7.0 Water Detail

7.1 Mitigation Measures Water

	Total CO2	CH4	N2O	CO2e
Category	MT/yr			
Mitigated	61.8709	2.8000e-003	5.8000e-004	62.1091
Unmitigated	61.8709	2.8000e-003	5.8000e-004	62.1091

7.2 Water by Land Use

Unmitigated

	Indoor/Outdoor Use	Total CO2	CH4	N2O	CO2e
Land Use	Mgal	MT/yr			
City Park	0 / 60.7655	61.8709	2.8000e-003	5.8000e-004	62.1091
Total		**61.8709**	**2.8000e-003**	**5.8000e-004**	**62.1091**

7.2 Water by Land Use

Mitigated

	Indoor/Outdoor Use	Total CO2	CH4	N2O	CO2e
Land Use	Mgal	MT/yr			
City Park	0 / 60.7655	61.8709	2.8000e-003	5.8000e-004	62.1091
Total		**61.8709**	**2.8000e-003**	**5.8000e-004**	**62.1091**

8.0 Waste Detail

8.1 Mitigation Measures Waste

Category/Year

	Total CO2	CH4	N2O	CO2e
	MT/yr			
Mitigated	0.8911	0.0527	0.0000	1.9971
Unmitigated	0.8911	0.0527	0.0000	1.9971

8.2 Waste by Land Use

Unmitigated

	Waste Disposed	Total CO2	CH4	N2O	CO2e
Land Use	tons	MT/yr			
City Park	4.39	0.8911	0.0527	0.0000	1.9971
Total		**0.8911**	**0.0527**	**0.0000**	**1.9971**

Mitigated

	Waste Disposed	Total CO2	CH4	N2O	CO2e
Land Use	tons	MT/yr			
City Park	4.39	0.8911	0.0527	0.0000	1.9971
Total		**0.8911**	**0.0527**	**0.0000**	**1.9971**

9.0 Operational Offroad

Equipment Type	Number	Hours/Day	Days/Year	Horse Power	Load Factor	Fuel Type

10.0 Vegetation

Sutter Pointe Regional Waste Water Conveyance Project TEIR - Forced Main Construction Only

Sacramento Valley Air Basin, Summer

1.0 Project Characteristics

1.1 Land Usage

Land Uses	Size	Metric	Lot Acreage	Floor Surface Area	Population
City Park	51.00	Acre	51.00	2,221,560.00	0

1.2 Other Project Characteristics

Urbanization	Rural	**Wind Speed (m/s)**	3.5	**Precipitation Freq (Days)**	65
Climate Zone	3			**Operational Year**	2016
Utility Company	Pacific Gas & Electric Company				
CO2 Intensity (lb/MWhr)	641.35	**CH4 Intensity (lb/MWhr)**	0.029	**N2O Intensity (lb/MWhr)**	0.006

1.3 User Entered Comments & Non-Default Data

Project Characteristics -

Land Use - Assumed Acreage = length of forced main (44,825 ft) * 50ft (assumed width) * 2.2957*10^-5

Construction Phase - Construction of the forced main would take at most 4 months to complete

Off-road Equipment - Construction equipment that would be used during the construction of the forced main

Trips and VMT - Adjusted worker trips

Grading -

Construction Off-road Equipment Mitigation -

Off-road Equipment - Equipment used over a four month duration.

Off-road Equipment - Equipment used over a one month duration.

Off-road Equipment - Equipment used over a two week duration.

Table Name	Column Name	Default Value	New Value
tblConstructionPhase	PhaseEndDate	9/30/2016	5/31/2016
tblConstructionPhase	PhaseEndDate	6/14/2016	5/13/2016
tblConstructionPhase	PhaseStartDate	9/1/2016	5/1/2016
tblConstructionPhase	PhaseStartDate	6/1/2016	5/1/2016
tblOffRoadEquipment	HorsePower	205.00	206.00
tblOffRoadEquipment	HorsePower	125.00	126.00
tblOffRoadEquipment	HorsePower	80.00	81.00
tblOffRoadEquipment	HorsePower	97.00	98.00
tblOffRoadEquipment	HorsePower	199.00	200.00
tblOffRoadEquipment	LoadFactor	0.50	0.50
tblOffRoadEquipment	LoadFactor	0.42	0.42
tblOffRoadEquipment	LoadFactor	0.38	0.38
tblOffRoadEquipment	LoadFactor	0.37	0.37
tblOffRoadEquipment	OffRoadEquipmentType		Plate Compactors
tblOffRoadEquipment	OffRoadEquipmentType		Bore/Drill Rigs
tblOffRoadEquipment	OffRoadEquipmentType		Pavers
tblOffRoadEquipment	OffRoadEquipmentType		Rollers
tblOffRoadEquipment	OffRoadEquipmentType	Rubber Tired Loaders	Tractors/Loaders/Backhoes
tblOffRoadEquipment	OffRoadEquipmentUnitAmount	0.00	1.00
tblOffRoadEquipment	OffRoadEquipmentUnitAmount	0.00	4.00
tblOffRoadEquipment	PhaseName		Forced Main - one Mo. Duration
tblOffRoadEquipment	PhaseName		Forced Main - Four Mo. Duration
tblOffRoadEquipment	PhaseName		Forced Main - two Wk. Duration
tblOffRoadEquipment	PhaseName		Forced Main - two Wk. Duration
tblOffRoadEquipment	PhaseName		Forced Main - two Wk. Duration
tblOffRoadEquipment	PhaseName		Forced Main - Four Mo. Duration
tblOffRoadEquipment	PhaseName		Forced Main - Four Mo. Duration

tblProjectCharacteristics	OperationalYear	2014	2016
tblProjectCharacteristics	UrbanizationLevel	Urban	Rural
tblTripsAndVMT	PhaseName		Forced Main - one Mo. Duration
tblTripsAndVMT	PhaseName		Forced Main - two Wk. Duration
tblTripsAndVMT	WorkerTripNumber	35.00	40.00

2.0 Emissions Summary

2.1 Overall Construction (Maximum Daily Emission)

Unmitigated Construction

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year	lb/day										lb/day					
2016	5.7612	61.8589	34.5461	0.0702	0.5109	3.2108	3.7217	0.1355	2.9690	3.1045	0.0000	7,093.9368	7,093.9368	1.9260	0.0000	7,134.3833
Total	**5.7612**	**61.8589**	**34.5461**	**0.0702**	**0.5109**	**3.2108**	**3.7217**	**0.1355**	**2.9690**	**3.1045**	**0.0000**	**7,093.9368**	**7,093.9368**	**1.9260**	**0.0000**	**7,134.3833**

Mitigated Construction

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year	lb/day										lb/day					
2016	5.7612	42.1272	34.5461	0.0702	0.5109	3.2108	3.7217	0.1355	2.9690	3.1045	0.0000	7,093.9368	7,093.9368	1.9260	0.0000	7,134.3833
Total	**5.7612**	**42.1272**	**34.5461**	**0.0702**	**0.5109**	**3.2108**	**3.7217**	**0.1355**	**2.9690**	**3.1045**	**0.0000**	**7,093.9368**	**7,093.9368**	**1.9260**	**0.0000**	**7,134.3833**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio-CO2	Total CO2	CH4	N20	CO2e
Percent Reduction	**0.00**	**31.90**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**

2.2 Overall Operational

Unmitigated Operational

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Area	61.6473	5.0000e-005	5.3400e-003	0.0000		2.0000e-005	2.0000e-005		2.0000e-005	2.0000e-005		0.0112	0.0112	3.0000e-005		0.0118
Energy	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000
Mobile	0.3886	0.8729	3.7647	6.8300e-003	0.4253	0.0121	0.4374	0.1138	0.0111	0.1249		599.6645	599.6645	0.0236		600.1604
Total	**62.0359**	**0.8729**	**3.7700**	**6.8300e-003**	**0.4253**	**0.0121**	**0.4374**	**0.1138**	**0.0111**	**0.1249**		**599.6757**	**599.6757**	**0.0236**	**0.0000**	**600.1722**

Mitigated Operational

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Area	61.6473	5.0000e-005	5.3400e-003	0.0000		2.0000e-005	2.0000e-005		2.0000e-005	2.0000e-005		0.0112	0.0112	3.0000e-005		0.0118
Energy	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000
Mobile	0.3886	0.8729	3.7647	6.8300e-003	0.4253	0.0121	0.4374	0.1138	0.0111	0.1249		599.6645	599.6645	0.0236		600.1604
Total	**62.0359**	**0.8729**	**3.7700**	**6.8300e-003**	**0.4253**	**0.0121**	**0.4374**	**0.1138**	**0.0111**	**0.1249**		**599.6757**	**599.6757**	**0.0236**	**0.0000**	**600.1722**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio-CO2	Total CO2	CH4	N20	CO2e
Percent Reduction	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

3.0 Construction Detail

Construction Phase

Phase Number	Phase Name	Phase Type	Start Date	End Date	Num Days Week	Num Days	Phase Description
1	Forced Main - Four Mo. Duration	Trenching	5/1/2016	8/31/2016	5	88	
2	Forced Main - one Mo. Duration	Trenching	5/1/2016	5/31/2016	5	22	
3	Forced Main - two Wk. Duration	Trenching	5/1/2016	5/13/2016	5	10	

Acres of Grading (Site Preparation Phase): 0

Acres of Grading (Grading Phase): 0

Acres of Paving: 0

Residential Indoor: 0; Residential Outdoor: 0; Non-Residential Indoor: 0; Non-Residential Outdoor: 0 (Architectural Coating – sqft)

OffRoad Equipment

Phase Name	Offroad Equipment Type	Amount	Usage Hours	Horse Power	Load Factor
Forced Main - one Mo. Duration	Plate Compactors	2	8.00	8	0.43
Forced Main - Four Mo. Duration	Generator Sets	1	4.00	84	0.74
Forced Main - two Wk. Duration	Bore/Drill Rigs	1	8.00	206	0.50
Forced Main - two Wk. Duration	Pavers	1	8.00	126	0.42
Forced Main - two Wk. Duration	Rollers	1	8.00	81	0.38
Forced Main - Four Mo. Duration	Tractors/Loaders/Backhoes	6	8.00	98	0.37
Forced Main - Four Mo. Duration	Rubber Tired Loaders	4	8.00	200	0.36

Trips and VMT

Phase Name	Offroad Equipment Count	Worker Trip Number	Vendor Trip Number	Hauling Trip Number	Worker Trip Length	Vendor Trip Length	Hauling Trip Length	Worker Vehicle Class	Vendor Vehicle Class	Hauling Vehicle Class
Forced Main - Four Mo. Duration	14	40.00	0.00	0.00	16.80	6.60	20.00	LD_Mix	HDT_Mix	HHDT
Forced Main - one Mo. Duration	0		0.00		16.80	6.60	20.00	LD_Mix	HDT_Mix	HHDT
Forced Main - two Wk. Duration	0		0.00		16.80	6.60	20.00	LD_Mix	HDT_Mix	HHDT

3.1 Mitigation Measures Construction

Use Soil Stabilizer

Reduce Vehicle Speed on Unpaved Roads

3.2 Forced Main - Four Mo. Duration - 2016

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	4.3816	48.1310	23.9025	0.0468		2.5747	2.5747		2.3823	2.3823		4,831.8889	4,831.8889	1.3920		4,861.1211
Total	**4.3816**	**48.1310**	**23.9025**	**0.0468**		**2.5747**	**2.5747**		**2.3823**	**2.3823**		**4,831.8889**	**4,831.8889**	**1.3920**		**4,861.1211**

3.2 Forced Main - Four Mo. Duration - 2016

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.2042	0.2525	3.2509	6.4800e-003	0.5109	3.6500e-003	0.5146	0.1355	3.3400e-003	0.1388		532.2563	532.2563	0.0259		532.7999
Total	**0.2042**	**0.2525**	**3.2509**	**6.4800e-003**	**0.5109**	**3.6500e-003**	**0.5146**	**0.1355**	**3.3400e-003**	**0.1388**		**532.2563**	**532.2563**	**0.0259**		**532.7999**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	4.3816	28.3993	23.9025	0.0468		2.5747	2.5747		2.3823	2.3823	0.0000	4,831.8889	4,831.8889	1.3920		4,861.1211
Total	**4.3816**	**28.3993**	**23.9025**	**0.0468**		**2.5747**	**2.5747**		**2.3823**	**2.3823**	**0.0000**	**4,831.8889**	**4,831.8889**	**1.3920**		**4,861.1211**

3.2 Forced Main - Four Mo. Duration - 2016

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.2042	0.2525	3.2509	6.4800e-003	0.5109	3.6500e-003	0.5146	0.1355	3.3400e-003	0.1388		532.2563	532.2563	0.0259		532.7999
Total	**0.2042**	**0.2525**	**3.2509**	**6.4800e-003**	**0.5109**	**3.6500e-003**	**0.5146**	**0.1355**	**3.3400e-003**	**0.1388**		**532.2563**	**532.2563**	**0.0259**		**532.7999**

3.3 Forced Main - one Mo. Duration - 2016

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	0.0802	0.5026	0.4209	9.7000e-004		0.0195	0.0195		0.0195	0.0195		68.9588	68.9588	7.1600e-003		69.1091
Total	**0.0802**	**0.5026**	**0.4209**	**9.7000e-004**		**0.0195**	**0.0195**		**0.0195**	**0.0195**		**68.9588**	**68.9588**	**7.1600e-003**		**69.1091**

3.3 Forced Main - one Mo. Duration - 2016

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**		**0.0000**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	0.0802	0.5026	0.4209	9.7000e-004		0.0195	0.0195		0.0195	0.0195	0.0000	68.9588	68.9588	7.1600e-003		69.1091
Total	**0.0802**	**0.5026**	**0.4209**	**9.7000e-004**		**0.0195**	**0.0195**		**0.0195**	**0.0195**	**0.0000**	**68.9588**	**68.9588**	**7.1600e-003**		**69.1091**

3.3 Forced Main - one Mo. Duration - 2016

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**		**0.0000**

3.4 Forced Main - two Wk. Duration - 2016

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	1.0952	12.9728	6.9718	0.0160		0.6129	0.6129		0.5639	0.5639		1,660.8328	1,660.8328	0.5010		1,671.3531
Total	**1.0952**	**12.9728**	**6.9718**	**0.0160**		**0.6129**	**0.6129**		**0.5639**	**0.5639**		**1,660.8328**	**1,660.8328**	**0.5010**		**1,671.3531**

3.4 Forced Main - two Wk. Duration - 2016

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**		**0.0000**

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Off-Road	1.0952	12.9728	6.9718	0.0160		0.6129	0.6129		0.5639	0.5639	0.0000	1,660.8328	1,660.8328	0.5010		1,671.3531
Total	**1.0952**	**12.9728**	**6.9718**	**0.0160**		**0.6129**	**0.6129**		**0.5639**	**0.5639**	**0.0000**	**1,660.8328**	**1,660.8328**	**0.5010**		**1,671.3531**

3.4 Forced Main - two Wk. Duration - 2016

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000	0.0000		0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**		**0.0000**

4.0 Operational Detail - Mobile

4.1 Mitigation Measures Mobile

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Mitigated	0.3886	0.8729	3.7647	6.8300e-003	0.4253	0.0121	0.4374	0.1138	0.0111	0.1249		599.6645	599.6645	0.0236		600.1604
Unmitigated	0.3886	0.8729	3.7647	6.8300e-003	0.4253	0.0121	0.4374	0.1138	0.0111	0.1249		599.6645	599.6645	0.0236		600.1604

4.2 Trip Summary Information

	Average Daily Trip Rate			Unmitigated	Mitigated
Land Use	Weekday	Saturday	Sunday	Annual VMT	Annual VMT
City Park	81.09	81.09	81.09	199,985	199,985
Total	81.09	81.09	81.09	199,985	199,985

4.3 Trip Type Information

	Miles			Trip %			Trip Purpose %		
Land Use	H-W or C-W	H-S or C-C	H-O or C-NW	H-W or C-W	H-S or C-C	H-O or C-NW	Primary	Diverted	Pass-by
City Park	14.70	6.60	6.60	33.00	48.00	19.00	66	28	6

LDA	LDT1	LDT2	MDV	LHD1	LHD2	MHD	HHD	OBUS	UBUS	MCY	SBUS	MH
0.462992	0.061838	0.181170	0.154683	0.057449	0.007359	0.019227	0.041233	0.001831	0.001687	0.006984	0.000699	0.002847

4.4 Fleet Mix

5.0 Energy Detail

Historical Energy Use: N

5.1 Mitigation Measures Energy

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
NaturalGas Mitigated	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000
NaturalGas Unmitigated	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000

5.2 Energy by Land Use - NaturalGas

Unmitigated

	NaturalGas Use	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Land Use	kBTU/yr	lb/day										lb/day					
City Park	0	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000
Total		**0.0000**	**0.0000**	**0.0000**	**0.0000**		**0.0000**	**0.0000**		**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**

Mitigated

	NaturalGas Use	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Land Use	kBTU/yr	lb/day										lb/day					
City Park	0	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000
Total		**0.0000**	**0.0000**	**0.0000**	**0.0000**		**0.0000**	**0.0000**		**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**

6.0 Area Detail

6.1 Mitigation Measures Area

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	lb/day										lb/day					
Mitigated	61.6473	5.0000e-005	5.3400e-003	0.0000		2.0000e-005	2.0000e-005		2.0000e-005	2.0000e-005		0.0112	0.0112	3.0000e-005		0.0118
Unmitigated	61.6473	5.0000e-005	5.3400e-003	0.0000		2.0000e-005	2.0000e-005		2.0000e-005	2.0000e-005		0.0112	0.0112	3.0000e-005		0.0118

6.2 Area by SubCategory

Unmitigated

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
SubCategory	lb/day										lb/day					
Architectural Coating	14.1054					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Consumer Products	47.5414					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Landscaping	5.2000e-004	5.0000e-005	5.3400e-003	0.0000		2.0000e-005	2.0000e-005		2.0000e-005	2.0000e-005		0.0112	0.0112	3.0000e-005		0.0118
Total	**61.6473**	**5.0000e-005**	**5.3400e-003**	**0.0000**		**2.0000e-005**	**2.0000e-005**		**2.0000e-005**	**2.0000e-005**		**0.0112**	**0.0112**	**3.0000e-005**		**0.0118**

6.2 Area by SubCategory

Mitigated

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
SubCategory	lb/day										lb/day					
Architectural Coating	14.1054					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Consumer Products	47.5414					0.0000	0.0000		0.0000	0.0000			0.0000			0.0000
Landscaping	5.2000e-004	5.0000e-005	5.3400e-003	0.0000		2.0000e-005	2.0000e-005		2.0000e-005	2.0000e-005		0.0112	0.0112	3.0000e-005		0.0118
Total	**61.6473**	**5.0000e-005**	**5.3400e-003**	**0.0000**		**2.0000e-005**	**2.0000e-005**		**2.0000e-005**	**2.0000e-005**		**0.0112**	**0.0112**	**3.0000e-005**		**0.0118**

7.0 Water Detail

7.1 Mitigation Measures Water

8.0 Waste Detail

8.1 Mitigation Measures Waste

9.0 Operational Offroad

Equipment Type	Number	Hours/Day	Days/Year	Horse Power	Load Factor	Fuel Type

10.0 Vegetation

Sutter Pointe Regional Waste Water Conveyance Project TEIR - Forced Main Construction Only

Sacramento Valley Air Basin, Annual

1.0 Project Characteristics

1.1 Land Usage

Land Uses	Size	Metric	Lot Acreage	Floor Surface Area	Population
City Park	51.00	Acre	51.00	2,221,560.00	0

1.2 Other Project Characteristics

Urbanization	Rural	**Wind Speed (m/s)**	3.5	**Precipitation Freq (Days)**	65
Climate Zone	3			**Operational Year**	2016
Utility Company	Pacific Gas & Electric Company				
CO2 Intensity (lb/MWhr)	641.35	**CH4 Intensity (lb/MWhr)**	0.029	**N2O Intensity (lb/MWhr)**	0.006

1.3 User Entered Comments & Non-Default Data

Project Characteristics -

Land Use - Assumed Acreage = length of forced main (44,825 ft) * 50ft (assumed width) * 2.2957*10^-5

Construction Phase - Construction of the forced main would take at most 4 months to complete

Off-road Equipment - Construction equipment that would be used during the construction of the forced main

Trips and VMT - Adjusted worker trips

Grading -

Construction Off-road Equipment Mitigation -

Off-road Equipment - Equipment used over a four month duration.

Off-road Equipment - Equipment used over a one month duration.

Off-road Equipment - Equipment used over a two week duration.

Table Name	Column Name	Default Value	New Value
tblConstructionPhase	PhaseEndDate	9/30/2016	5/31/2016
tblConstructionPhase	PhaseEndDate	6/14/2016	5/13/2016
tblConstructionPhase	PhaseStartDate	9/1/2016	5/1/2016
tblConstructionPhase	PhaseStartDate	6/1/2016	5/1/2016
tblOffRoadEquipment	HorsePower	205.00	206.00
tblOffRoadEquipment	HorsePower	125.00	126.00
tblOffRoadEquipment	HorsePower	80.00	81.00
tblOffRoadEquipment	HorsePower	97.00	98.00
tblOffRoadEquipment	HorsePower	199.00	200.00
tblOffRoadEquipment	LoadFactor	0.50	0.50
tblOffRoadEquipment	LoadFactor	0.42	0.42
tblOffRoadEquipment	LoadFactor	0.38	0.38
tblOffRoadEquipment	LoadFactor	0.37	0.37
tblOffRoadEquipment	OffRoadEquipmentType		Plate Compactors
tblOffRoadEquipment	OffRoadEquipmentType		Bore/Drill Rigs
tblOffRoadEquipment	OffRoadEquipmentType		Pavers
tblOffRoadEquipment	OffRoadEquipmentType		Rollers
tblOffRoadEquipment	OffRoadEquipmentType	Rubber Tired Loaders	Tractors/Loaders/Backhoes
tblOffRoadEquipment	OffRoadEquipmentUnitAmount	0.00	1.00
tblOffRoadEquipment	OffRoadEquipmentUnitAmount	0.00	4.00
tblOffRoadEquipment	PhaseName		Forced Main - one Mo. Duration
tblOffRoadEquipment	PhaseName		Forced Main - Four Mo. Duration
tblOffRoadEquipment	PhaseName		Forced Main - two Wk. Duration
tblOffRoadEquipment	PhaseName		Forced Main - two Wk. Duration
tblOffRoadEquipment	PhaseName		Forced Main - two Wk. Duration
tblOffRoadEquipment	PhaseName		Forced Main - Four Mo. Duration
tblOffRoadEquipment	PhaseName		Forced Main - Four Mo. Duration

tblProjectCharacteristics	OperationalYear	2014	2016
tblProjectCharacteristics	UrbanizationLevel	Urban	Rural
tblTripsAndVMT	PhaseName		Forced Main - one Mo. Duration
tblTripsAndVMT	PhaseName		Forced Main - two Wk. Duration
tblTripsAndVMT	WorkerTripNumber	35.00	40.00

2.0 Emissions Summary

2.1 Overall Construction

Unmitigated Construction

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year	tons/yr										MT/yr					
2016	0.2068	2.2006	1.2132	2.4100e-003	0.0216	0.1167	0.1383	5.7500e-003	0.1080	0.1138	0.0000	220.3228	220.3228	0.0589	0.0000	221.5605
Total	**0.2068**	**2.2006**	**1.2132**	**2.4100e-003**	**0.0216**	**0.1167**	**0.1383**	**5.7500e-003**	**0.1080**	**0.1138**	**0.0000**	**220.3228**	**220.3228**	**0.0589**	**0.0000**	**221.5605**

Mitigated Construction

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Year	tons/yr										MT/yr					
2016	0.2068	1.3324	1.2132	2.4100e-003	0.0216	0.1167	0.1383	5.7500e-003	0.1080	0.1138	0.0000	220.3226	220.3226	0.0589	0.0000	221.5603
Total	**0.2068**	**1.3324**	**1.2132**	**2.4100e-003**	**0.0216**	**0.1167**	**0.1383**	**5.7500e-003**	**0.1080**	**0.1138**	**0.0000**	**220.3226**	**220.3226**	**0.0589**	**0.0000**	**221.5603**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio-CO2	Total CO2	CH4	N20	CO2e
Percent Reduction	**0.00**	**39.45**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**

2.2 Overall Operational

Unmitigated Operational

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Area	11.2506	0.0000	4.8000e-004	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	9.1000e-004	9.1000e-004	0.0000	0.0000	9.7000e-004
Energy	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Mobile	0.0641	0.1703	0.6685	1.1600e-003	0.0745	2.2100e-003	0.0767	0.0200	2.0300e-003	0.0220	0.0000	92.4347	92.4347	3.9000e-003	0.0000	92.5165
Waste						0.0000	0.0000		0.0000	0.0000	0.8911	0.0000	0.8911	0.0527	0.0000	1.9971
Water						0.0000	0.0000		0.0000	0.0000	0.0000	61.8709	61.8709	2.8000e-003	5.8000e-004	62.1091
Total	**11.3147**	**0.1703**	**0.6690**	**1.1600e-003**	**0.0745**	**2.2100e-003**	**0.0767**	**0.0200**	**2.0300e-003**	**0.0220**	**0.8911**	**154.3065**	**155.1976**	**0.0594**	**5.8000e-004**	**156.6236**

2.2 Overall Operational

Mitigated Operational

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Area	11.2506	0.0000	4.8000e-004	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	9.1000e-004	9.1000e-004	0.0000	0.0000	9.7000e-004
Energy	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Mobile	0.0641	0.1703	0.6685	1.1600e-003	0.0745	2.2100e-003	0.0767	0.0200	2.0300e-003	0.0220	0.0000	92.4347	92.4347	3.9000e-003	0.0000	92.5165
Waste						0.0000	0.0000		0.0000	0.0000	0.8911	0.0000	0.8911	0.0527	0.0000	1.9971
Water						0.0000	0.0000		0.0000	0.0000	0.0000	61.8709	61.8709	2.8000e-003	5.8000e-004	62.1091
Total	**11.3147**	**0.1703**	**0.6690**	**1.1600e-003**	**0.0745**	**2.2100e-003**	**0.0767**	**0.0200**	**2.0300e-003**	**0.0220**	**0.8911**	**154.3065**	**155.1976**	**0.0594**	**5.8000e-004**	**156.6236**

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio-CO2	Total CO2	CH4	N20	CO2e
Percent Reduction	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**

3.0 Construction Detail

Construction Phase

Phase Number	Phase Name	Phase Type	Start Date	End Date	Num Days Week	Num Days	Phase Description
1	Forced Main - Four Mo. Duration	Trenching	5/1/2016	8/31/2016	5	88	
2	Forced Main - one Mo. Duration	Trenching	5/1/2016	5/31/2016	5	22	
3	Forced Main - two Wk. Duration	Trenching	5/1/2016	5/13/2016	5	10	

Acres of Grading (Site Preparation Phase): 0

Acres of Grading (Grading Phase): 0

Acres of Paving: 0

Residential Indoor: 0; Residential Outdoor: 0; Non-Residential Indoor: 0; Non-Residential Outdoor: 0 (Architectural Coating – sqft)

OffRoad Equipment

Phase Name	Offroad Equipment Type	Amount	Usage Hours	Horse Power	Load Factor
Forced Main - one Mo. Duration	Plate Compactors	2	8.00	8	0.43
Forced Main - Four Mo. Duration	Generator Sets	1	4.00	84	0.74
Forced Main - two Wk. Duration	Bore/Drill Rigs	1	8.00	206	0.50
Forced Main - two Wk. Duration	Pavers	1	8.00	126	0.42
Forced Main - two Wk. Duration	Rollers	1	8.00	81	0.38
Forced Main - Four Mo. Duration	Tractors/Loaders/Backhoes	6	8.00	98	0.37
Forced Main - Four Mo. Duration	Rubber Tired Loaders	4	8.00	200	0.36

Trips and VMT

Phase Name	Offroad Equipment Count	Worker Trip Number	Vendor Trip Number	Hauling Trip Number	Worker Trip Length	Vendor Trip Length	Hauling Trip Length	Worker Vehicle Class	Vendor Vehicle Class	Hauling Vehicle Class
Forced Main - Four Mo. Duration	14	40.00	0.00	0.00	16.80	6.60	20.00	LD_Mix	HDT_Mix	HHDT
Forced Main - one Mo. Duration	0		0.00		16.80	6.60	20.00	LD_Mix	HDT_Mix	HHDT
Forced Main - two Wk. Duration	0		0.00		16.80	6.60	20.00	LD_Mix	HDT_Mix	HHDT

3.1 Mitigation Measures Construction

Use Soil Stabilizer

Reduce Vehicle Speed on Unpaved Roads

3.2 Forced Main - Four Mo. Duration - 2016

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	0.1928	2.1178	1.0517	2.0600e-003		0.1133	0.1133		0.1048	0.1048	0.0000	192.8703	192.8703	0.0556	0.0000	194.0371
Total	**0.1928**	**2.1178**	**1.0517**	**2.0600e-003**		**0.1133**	**0.1133**		**0.1048**	**0.1048**	**0.0000**	**192.8703**	**192.8703**	**0.0556**	**0.0000**	**194.0371**

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	7.6200e-003	0.0124	0.1220	2.6000e-004	0.0216	1.6000e-004	0.0218	5.7500e-003	1.5000e-004	5.8900e-003	0.0000	19.2309	19.2309	1.0300e-003	0.0000	19.2526
Total	**7.6200e-003**	**0.0124**	**0.1220**	**2.6000e-004**	**0.0216**	**1.6000e-004**	**0.0218**	**5.7500e-003**	**1.5000e-004**	**5.8900e-003**	**0.0000**	**19.2309**	**19.2309**	**1.0300e-003**	**0.0000**	**19.2526**

3.2 Forced Main - Four Mo. Duration - 2016

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	0.1928	1.2496	1.0517	2.0600e-003		0.1133	0.1133		0.1048	0.1048	0.0000	192.8701	192.8701	0.0556	0.0000	194.0369
Total	**0.1928**	**1.2496**	**1.0517**	**2.0600e-003**		**0.1133**	**0.1133**		**0.1048**	**0.1048**	**0.0000**	**192.8701**	**192.8701**	**0.0556**	**0.0000**	**194.0369**

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	7.6200e-003	0.0124	0.1220	2.6000e-004	0.0216	1.6000e-004	0.0218	5.7500e-003	1.5000e-004	5.8900e-003	0.0000	19.2309	19.2309	1.0300e-003	0.0000	19.2526
Total	**7.6200e-003**	**0.0124**	**0.1220**	**2.6000e-004**	**0.0216**	**1.6000e-004**	**0.0218**	**5.7500e-003**	**1.5000e-004**	**5.8900e-003**	**0.0000**	**19.2309**	**19.2309**	**1.0300e-003**	**0.0000**	**19.2526**

3.3 Forced Main - one Mo. Duration - 2016

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	8.8000e-004	5.5300e-003	4.6300e-003	1.0000e-005		2.1000e-004	2.1000e-004		2.1000e-004	2.1000e-004	0.0000	0.6881	0.6881	7.0000e-005	0.0000	0.6896
Total	**8.8000e-004**	**5.5300e-003**	**4.6300e-003**	**1.0000e-005**		**2.1000e-004**	**2.1000e-004**		**2.1000e-004**	**2.1000e-004**	**0.0000**	**0.6881**	**0.6881**	**7.0000e-005**	**0.0000**	**0.6896**

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**

3.3 Forced Main - one Mo. Duration - 2016

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	8.8000e-004	5.5300e-003	4.6300e-003	1.0000e-005		2.1000e-004	2.1000e-004		2.1000e-004	2.1000e-004	0.0000	0.6881	0.6881	7.0000e-005	0.0000	0.6896
Total	**8.8000e-004**	**5.5300e-003**	**4.6300e-003**	**1.0000e-005**		**2.1000e-004**	**2.1000e-004**		**2.1000e-004**	**2.1000e-004**	**0.0000**	**0.6881**	**0.6881**	**7.0000e-005**	**0.0000**	**0.6896**

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**

3.4 Forced Main - two Wk. Duration - 2016

Unmitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	5.4800e-003	0.0649	0.0349	8.0000e-005		3.0600e-003	3.0600e-003		2.8200e-003	2.8200e-003	0.0000	7.5334	7.5334	2.2700e-003	0.0000	7.5811
Total	**5.4800e-003**	**0.0649**	**0.0349**	**8.0000e-005**		**3.0600e-003**	**3.0600e-003**		**2.8200e-003**	**2.8200e-003**	**0.0000**	**7.5334**	**7.5334**	**2.2700e-003**	**0.0000**	**7.5811**

Unmitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**

3.4 Forced Main - two Wk. Duration - 2016

Mitigated Construction On-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Off-Road	5.4800e-003	0.0649	0.0349	8.0000e-005		3.0600e-003	3.0600e-003		2.8200e-003	2.8200e-003	0.0000	7.5334	7.5334	2.2700e-003	0.0000	7.5811
Total	**5.4800e-003**	**0.0649**	**0.0349**	**8.0000e-005**		**3.0600e-003**	**3.0600e-003**		**2.8200e-003**	**2.8200e-003**	**0.0000**	**7.5334**	**7.5334**	**2.2700e-003**	**0.0000**	**7.5811**

Mitigated Construction Off-Site

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Hauling	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Vendor	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Worker	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**

4.0 Operational Detail - Mobile

4.1 Mitigation Measures Mobile

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Mitigated	0.0641	0.1703	0.6685	1.1600e-003	0.0745	2.2100e-003	0.0767	0.0200	2.0300e-003	0.0220	0.0000	92.4347	92.4347	3.9000e-003	0.0000	92.5165
Unmitigated	0.0641	0.1703	0.6685	1.1600e-003	0.0745	2.2100e-003	0.0767	0.0200	2.0300e-003	0.0220	0.0000	92.4347	92.4347	3.9000e-003	0.0000	92.5165

4.2 Trip Summary Information

	Average Daily Trip Rate			Unmitigated	Mitigated
Land Use	Weekday	Saturday	Sunday	Annual VMT	Annual VMT
City Park	81.09	81.09	81.09	199,985	199,985
Total	81.09	81.09	81.09	199,985	199,985

4.3 Trip Type Information

	Miles			Trip %			Trip Purpose %		
Land Use	H-W or C-W	H-S or C-C	H-O or C-NW	H-W or C-W	H-S or C-C	H-O or C-NW	Primary	Diverted	Pass-by
City Park	14.70	6.60	6.60	33.00	48.00	19.00	66	28	6

LDA	LDT1	LDT2	MDV	LHD1	LHD2	MHD	HHD	OBUS	UBUS	MCY	SBUS	MH
0.462992	0.061838	0.181170	0.154683	0.057449	0.007359	0.019227	0.041233	0.001831	0.001687	0.006984	0.000699	0.002847

4.4 Fleet Mix

5.0 Energy Detail

Historical Energy Use: N

5.1 Mitigation Measures Energy

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Electricity Mitigated						0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Electricity Unmitigated						0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
NaturalGas Mitigated	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
NaturalGas Unmitigated	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000

5.2 Energy by Land Use - NaturalGas

Unmitigated

	NaturalGas Use	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Land Use	kBTU/yr	tons/yr										MT/yr					
City Park	0	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total		**0.0000**	**0.0000**	**0.0000**	**0.0000**		**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**

5.2 Energy by Land Use - NaturalGas

Mitigated

	NaturalGas Use	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Land Use	kBTU/yr	tons/yr										MT/yr					
City Park	0	0.0000	0.0000	0.0000	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Total		**0.0000**	**0.0000**	**0.0000**	**0.0000**		**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**	**0.0000**

5.3 Energy by Land Use - Electricity

Unmitigated

	Electricity Use	Total CO2	CH4	N2O	CO2e
Land Use	kWh/yr	MT/yr			
City Park	0	0.0000	0.0000	0.0000	0.0000
Total		**0.0000**	**0.0000**	**0.0000**	**0.0000**

5.3 Energy by Land Use - Electricity

Mitigated

	Electricity Use	Total CO2	CH4	N2O	CO2e
Land Use	kWh/yr	MT/yr			
City Park	0	0.0000	0.0000	0.0000	0.0000
Total		**0.0000**	**0.0000**	**0.0000**	**0.0000**

6.0 Area Detail

6.1 Mitigation Measures Area

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
Category	tons/yr										MT/yr					
Mitigated	11.2506	0.0000	4.8000e-004	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	9.1000e-004	9.1000e-004	0.0000	0.0000	9.7000e-004
Unmitigated	11.2506	0.0000	4.8000e-004	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	9.1000e-004	9.1000e-004	0.0000	0.0000	9.7000e-004

6.2 Area by SubCategory

Unmitigated

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
SubCategory	tons/yr										MT/yr					
Architectural Coating	2.5742					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Consumer Products	8.6763					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Landscaping	5.0000e-005	0.0000	4.8000e-004	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	9.1000e-004	9.1000e-004	0.0000	0.0000	9.7000e-004
Total	**11.2506**	**0.0000**	**4.8000e-004**	**0.0000**		**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**	**9.1000e-004**	**9.1000e-004**	**0.0000**	**0.0000**	**9.7000e-004**

Mitigated

	ROG	NOx	CO	SO2	Fugitive PM10	Exhaust PM10	PM10 Total	Fugitive PM2.5	Exhaust PM2.5	PM2.5 Total	Bio- CO2	NBio- CO2	Total CO2	CH4	N2O	CO2e
SubCategory	tons/yr										MT/yr					
Architectural Coating	2.5742					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Consumer Products	8.6763					0.0000	0.0000		0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000	0.0000
Landscaping	5.0000e-005	0.0000	4.8000e-004	0.0000		0.0000	0.0000		0.0000	0.0000	0.0000	9.1000e-004	9.1000e-004	0.0000	0.0000	9.7000e-004
Total	**11.2506**	**0.0000**	**4.8000e-004**	**0.0000**		**0.0000**	**0.0000**		**0.0000**	**0.0000**	**0.0000**	**9.1000e-004**	**9.1000e-004**	**0.0000**	**0.0000**	**9.7000e-004**

7.0 Water Detail

7.1 Mitigation Measures Water

	Total CO2	CH4	N2O	CO2e
Category	MT/yr			
Mitigated	61.8709	2.8000e-003	5.8000e-004	62.1091
Unmitigated	61.8709	2.8000e-003	5.8000e-004	62.1091

7.2 Water by Land Use

Unmitigated

	Indoor/Outdoor Use	Total CO2	CH4	N2O	CO2e
Land Use	Mgal	MT/yr			
City Park	0 / 60.7655	61.8709	2.8000e-003	5.8000e-004	62.1091
Total		**61.8709**	**2.8000e-003**	**5.8000e-004**	**62.1091**

7.2 Water by Land Use

Mitigated

	Indoor/Outdoor Use	Total CO2	CH4	N2O	CO2e
Land Use	Mgal	MT/yr			
City Park	0 / 60.7655	61.8709	2.8000e-003	5.8000e-004	62.1091
Total		**61.8709**	**2.8000e-003**	**5.8000e-004**	**62.1091**

8.0 Waste Detail

8.1 Mitigation Measures Waste

Category/Year

	Total CO2	CH4	N2O	CO2e
	MT/yr			
Mitigated	0.8911	0.0527	0.0000	1.9971
Unmitigated	0.8911	0.0527	0.0000	1.9971

8.2 Waste by Land Use

Unmitigated

	Waste Disposed	Total CO2	CH4	N2O	CO2e
Land Use	tons	MT/yr			
City Park	4.39	0.8911	0.0527	0.0000	1.9971
Total		**0.8911**	**0.0527**	**0.0000**	**1.9971**

Mitigated

	Waste Disposed	Total CO2	CH4	N2O	CO2e
Land Use	tons	MT/yr			
City Park	4.39	0.8911	0.0527	0.0000	1.9971
Total		**0.8911**	**0.0527**	**0.0000**	**1.9971**

9.0 Operational Offroad

Equipment Type	Number	Hours/Day	Days/Year	Horse Power	Load Factor	Fuel Type

10.0 Vegetation

Emergency Diesel Backup Generator Pollutant Emissions

Alternative	Type	Number of Generators	HP	Hour per day	LF	ROG [g/bhp-hr][1]	NOx [g/bhp-hr][1]	PM10 [g/bhp-hr][1]	PM2.5 [g/bhp-hr][1]	ROG [ppd]	NOx [ppd]	PM10 [ppd]	PM2.5 [ppd]	PM10 [tpy]	PM2.5 [tpy]
Pumps	Emergency Generator	2	300	2	70%	0.2390	2.8820	0.0840	0.0840	0.22	2.66	0.08	0.08	0.002	0.002

1. Emission factors for the emergency generators were obtain from the Offroad2011 Model.

Indirect GHG Emissions

The pump station is assumed to operate for 24 hours per day

P= 624.0 kwh

Energy provider is PG&E

CO2e Intesity factor[1]= 370.0 lbs/MWh
CO2e Intesity factor= 0.4 lbs/kwh
Source: PG&E, 2015

E_{ghg}= 230.9 lbs CO2e per day

E_{ghg}= 38.3 Metric Tons of CO2e per year

The pump station is assumed to operate for 24 hours per day

P= 3,480.0 kwh

Energy provider is SMUD

CO2e Intesity factor[1]= 370.0 lbs/MWh
CO2e Intesity factor= 0.4 lbs/kwh
Source: PG&E, 2015

E_{ghg}= 1,287.6 lbs CO2e per day

E_{ghg}= 213.3 Metric Tons of CO2e per year

The Odor Control Facility assumed to operate for 24 hours per day

P= 500.0 kw

Energy provider is SMUD

CO2e Intesity factor[1]= 590.3
CO2e Intesity factor= 0.6
Source: California Alimate Action Registry, 2009

E_{ghg}= 295.2

E_{ghg}= 48.9

Total E_{ghg} = 300.5 Metric Tons of CO2e per year